DISTRIBUTION AND WAREHOUSING

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Freight by Air

TRANSPORT of freight by air is today available from and to about two hundred cities in the United States, fifteen in Canada and a dozen in Mexico. Not having been developed spectacularly and not having been advertised extensively, it is not widely known by companies which might profitably move their goods forward by plane. For emergency and important shipments of 200 pounds and less, the air may save both time and money, and rates are coming down every month.

¶Transport of freight by air offers many unexpected economies to the shipper, not only for the occasional parcel but for more frequent use where speed, and possibly good will, are concerned.

¶Transport of freight by air is now operated on schedules, in both directions:

Four times a day between

—New York and Boston.

Three times a day between

-Chicago and Twin Cities.

Twice a day between

- —Los Angeles and Salt Lake City.
- -Salt Lake City and Pasco, Wash.
- —Los Angeles and San Francisco.
- -Portland and Seattle.
- -Pittsburgh and Cleveland.
- -New York and Chicago.
- -New York and Atlanta.
- -Chicago and San Francisco.
- —Chicago and Cincinnati.
- —Los Angeles and Avalon.
- -Tulsa and Oklahoma City.

Once a day over

-34 other routes.

¶All reputable air carriers are working toward a country-wide system of freight by air. They are experimenting to standardize and improve pick-up and delivery services.

¶H. A. Haring, in his article beginning on the next page, presents background and facts and figures of informative interest to executives in the distribution field.

Its Economic Relation to Public Warehousing

Number 66

Transport of Freight by Air—Is It a Novelty or a Real Service to Merchandising? Rates and Functions

By H. A. HARING

HE aircraft industry emerged from its experimental stage in 1914, just before the outbreak of the war. During the ensuing four years flying for military purposes absorbed all attention, and, during the six or seven years immediately following, there was little increase in the output of planes. That period, which ended in 1925, was devoted to technical improvements in equipment and to methodical studies of air currents, landing fields, best routes, lighting devices for airways, etc.

Throughout all this period, from 1914 to 1925, the principal market in this country was the United States Government. Few commercial planes were in operation and the makers concentrated their selling efforts on the War Department and the Post Office Department.

Civilian demand for planes began about 1925. At about that time the Post Office Department showed a dis-

position to let out the carrying of air mail. The Government adopted a policy of making contracts with private-operators for the mail instead of creating a Government-owned or Government-operated system of lines for the air mail. This policy encouraged the establishment of routes by business firms on the basis of earning profits, and, when Lindbergh made his famous flight in 1927 there suddenly developed a public interest in the carrying of passengers.

During 1927 and 1928 we witnessed expansion in air planes. Passenger routes sprang up everywhere. Hardly a town could withstand the temptation to advertise its flying field—that temptation being multiplied by the real estate men who had acreage to sell. Stunt fliers, with their \$3 or \$5 for "first experience" in the air, made

planes familiar things everywhere.

M EANWHILE the manufacturers of planes and motors were looking for a market. Their output was growing. It was leaping ahead of the demand, that demand being limited to contractors for air mail, operators of flying schools, the War Department, individuals offering air-taxi service, and persons or firms for their own use

There was, as well we know, also the passenger service. This was increasing. It has continued to grow, and, at the present time, it is the source of millions of income, especially since the railroads have combined with air transportation to establish rail-and-air routes for long distance travel.

Nevertheless, even with high fares, the passenger planes need more revenue in order to be profitable. The cost of operation is high. Their sponsors are trying their best to develop other sources of income, hoping always to hit upon something that will give regular and dependable receipts—something that will demand fast transportation on days when passengers fear the wind or the intense

cold or the fog or the heavy rainstorms.

For, with the establishment of scheduled flights, it becomes necessary to make the trip regardless of what the revenue may be. A published service, in the air, must fly with regularity, just as the railroad must operate its merchandise car or Pullman whether it goes empty or requires extra cars. We would not go on record as stating that every flight is made as scheduled, for, as a matter of fact, precision of that sort has not yet become possible; yet, subject to weather and rather unusual circumstances, the planes run on schedule with surprising regularity.

With the railroads, something like fivesixths of total income comes from freight. Passengers and mail demand fast trains; both are spectacular; both are wanted by every railroad. Yet, were it not for freight, the railroads would be abandoned. Naturally, therefore, air transportation has turned to freight by air for income that shall be dependable and fairly regular.

The air mail itself has proven that

some demand exists for transportation of freight in planes. In addition to the first class matter which goes in the mail, the Post Office Department handles every night such items as rush shipments of samples and out-of-stock merchandise, emergency shipment of spare parts for machinery, goods required by merchants for Saturday morning delivery, etc. Although postage must be paid at letter rates, much matter of this sort is carried, the five cents for the first ounce and ten for excess, or a total of \$1.55 a pound, being willingly paid for the sake of speedy delivery.

No sooner had passenger service been launched than the companies felt the need for carrying goods. As an example of what happened, let me quote the Colonial Air Transport Co., which operates four passenger trips a day in each direction between New York and Boston. They tell me:

"We started operating an airplane between New York and Boston on the 15th of May, 1929, using a tri-motored Ford carrying twelve passengers and a crew of inquif pladid the so this con

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of three. From time to time we had inquiries from people wanting to know if we would carry a package on the plane. Purely as an accommodation we did this. We required the people to meet the plane at the other end of the trip so as to receive the package.

"There was a growing demand for this service. We wished also to overcome the old bugaboo of the slowness of air express on the ground (before and after the flight) and therefore we conceived the idea of tying up with the Western Union's messenger service so as to give both speed in the air and speed on the ground to the senders of air express over our lines from New York to

"We started off with a rate of \$5 as the minimum charge. That is, a package would cost \$5 whether it weighed one pound or fifteen. We found, however, that the majority of our packages averaged around two pounds and that \$5 did seem rather steep to charge for that poundage. In less than a year, on March 1, 1930, we reduced this rate considerably; that is, the initial cost was dropped from \$5 for the first pound to \$1.25 for the first pound. With this decrease in price, the number of packages jumped

The contracts for air mail permit the planes also to carry freight. Freight, however, is usually spoken of as "express" for the reason that all shipments are expedited from start to finish. Thus such a concern as National Air Transport, Inc., carries only mail and express shipments on its two principal routes, between New York and Chicago and between Chicago and Dallas. The Ford Airways, for another example, carry neither mail nor passengers, their entire space being under contract for merchandise. Of express shipments of this sort these lines now carry close to 1,000,000 pounds a year between Detroit and Chicago and slightly more between Detroit and Buffa'o.

It is the judgment of James C. Willson of the Curtiss-Wright Corporation that:

"The whole history of transportation points to only one conclusion-that airplanes must look to goods for their basic revenue and profit, to the same degree that railroads and other shipping companies have done. . . . I look for the time in the very near future when every American city of any commercial importance will be an air express center."

Looking into that "near future" Mr. Willson prophesies:

"I expect, for example, to see the manufacturer of Birmingham make deliveries in Memphis on the afternoon of the day he receives an order. growers in Florida will be shipping oranges, sun-ripened on the trees, direct to the major markets of the north. Fresh figs from Mississippi will be delivered in

a few hours to the leading grocers in New York. Morning newspapers from other sections will be on the breakfast tables of the South anywhere within a 1,000-mile radius the same morning they are being read in the city of publication. This will introduce a new tempo and a faster pace to all business in the South, under the impetus of air express."

Volume

A IRPLANE routes change so rapidly that no statement can be up to date. On authority, however, of the Aeronautics Division of the Department of Commerce, for the month of July of the present year, express shipments are made four times each day, in each direction, between New York and Boston. This appears to be the most frequent service now in operation.

Shortly, however, a service will be offered from Newark Airport to Washington and Baltimore which will greatly enlarge the New York-Boston facilities for freight. The planes from Boston now use the Newark Airport for metropolitan New York, that same port being the northern terminal of the proposed route to Washington. By a transfer, therefore, therefore, of goods from plane to plane at Newark a through routing will be available from Boston to Washington and Baltimore, with three or four trips each day.

Express shipments, at the present time, may be made twice a day, in either direction, between Los Angeles and Salt Lake; Salt Lake and Pasco (Wash.); Los Angeles and San Francisco; Portland and Seattle; Pittsburgh and Cleveland; New York and Chicago; Chicago and San Francisco; Atlanta and New York; Cincinnati and Chicago; Los Angeles and Avalon (Catalina Island); Tulsa and Oklahoma City; while three trips each way are operated daily between Chicago and the Twin Cities. Many of the spur or feeder airplane routes offer service for express shipments three or four times a day, but these are supplemental routes to the main arterial ones.

Daily shipment of freight, or at least six days a week, are in effect over the remaining number of the 47 chartered air express routes.

Statistics of the volume of freight transported are apt to be misleading, for the reason that the latest compilation is that for the six-months' period of July to December, 1929. The quantity thus shipped during the first six months of 1930 has increased very much but the official figures will hardly be available before November and therefore cannot be here used.

For the final half of 1929, however, the Department of Commerce furnishes us the following tonnages, which will indicate where the heavy shipments are

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Shipments of Express Matter by Air, July-December, 1929

Between	Pounds Carried
San Francisco-Chicago	17,640
New York-Montreal	2,303
New York-Chicago	38,862
Chicago-Dallas	2,440
Los Angeles-Seattle	2,695
Los Angeles-Salt Lake	13,306
Los Angeles-Avalon	14,243
Los Angeles-El Paso	1,509
Seattle-Bremerton	6,153
Detroit-Chicago	388,039
Detroit-Buffalo	390,848

Unfortunately, as already hinted, these figures inadequately tell the story of 1930. Many new routes have come into operation since the first of the year, and several of those here listed have greatly expanded their volume.

Commodities

FCR shipment by air express some limitations have become necessary. The list of prohibited articles includes some which would suffer from the shock of landing, from freezing at high altitudes, from quick expansion in the lesser density of the air in crossing mountains, etc. Yet the list is surprisingly brief at

The following are not accepted for transportation by air, under the regulations of most companies:

(a) Shipments valued in excess of \$5,000. Up to a value of \$50 a package the company is fully liable for the value; beyond that sum there is no liability, unless the true value has been declared by shipper and an additional rate paid of 15-cents for each \$100 of value, in the United States, or 12 cents for each \$50 in Canada.

(b) Packages weighing more than 200 pounds.

pounds.
(c) Packages of extreme bulk or un-

S.
Packages of extreme pure dimensions (see following).
Explosives, inflammable articles, fragile articles.

usual dimensions (see following).

(d) Explosives, inflammable articles, acids, live freight, fragile articles liable to damage from shock, articles liable to freeze, etc.

(e) Any shipment which would not be acceptable for shipment by express over the railroads. This includes goods which it is unlawful to ship, and, in Canada, prohibits shipment of letters or circulars, whether sealed or unsealed, which are intended to be put into the mails.

Packages of unusual dimensions, unusual shape, or extreme length, cannot be accepted for transportation by air unless special arrangements for handling have been previously made. Packages whose combined length and girth exceed 106 inches also can be shipped only when arrangements have been made.

The method of calculating this "combined length and girth" are thus given in the tariffs:

Package 42 inches long, 19 inches wide, 14 inches deep, would measure 108 inches, as follows: Inches

Combined length and girth... 108

As a rule, too, no package will be accepted (unless special arrangements have been made) which is more than 60 inches long and 19 inches wide; and any package more than 40 inches long, what-

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ever its width up to the 19 inches, cannot be more than 4 inches deep.

Despite these restrictions the companies rather willingly make "the special arrangements" of which the tariffs speak so often. The cockpit is stripped of its fittings to accommodate a shipment, particularly if the revenue therefrom is promising.

Light and bulky packages are accepted on a rate that is a combination of weight and measurement, much after the manner of ocean shipping by the "cubic ton." In ocean traffic, the rate is quoted on a ton of goods, but that ton is either a ton by weight or 40 cubic feet, "whichever will yield the greater revenue." So, in air transportation, the pound is either 16 ounces or 200 cubic inches, whichever will give the larger revenue. Inasmuch, further, as rates by air are quoted, not by the pound, but by the quarterpound (in most instances), a given rate applies either to 4 ounces by weight or 50 cubic inches by bulk.

Thus the Railway Express Agency gives in its tariffs the following example for calculating the rate on "light and bulky" packages:

"The rates shown herein are based on a cubic measurement of not more than 50 cubic inches to each quarterpound. When any package exceeds this basis, it will be charged for on the basis of one quarter-pound for each 50 cubic inches or fraction thereof.

each 50 cubic inches or fraction thereof,
"EXAMPLE—A package measuring
10 x 14 x 3 inches and weighing 2
pounds, New York to Chicago, rate 25c.
per quarter-pound. "Multiplying 10 x 14 x 3 equals 420
cubic inches, which, divided by 50,
equals 82/5. On the basis of onequarter pound for each 50 cubic inches
or fraction thereof, this package would
be assessed 9 times the quarter-pound
charge of 25c., or a total of \$2.25."

The commodities shipped by air include almost everything for which expeditious handling is required. Inasmuch as the rates are high and the service is specialized, frequent shipment comes only for articles which justify the cost. Culled from data furnished personally by seven of the principal air carriers, we list the following as probably the goods most commonly shipped by air:

Plates, mats, half-tones, electrotypes,

Plates, mats, half-tones, electrotypes, etc.
Photographs.
News reels, films, etc.
Copy for emergency advertising.
Clothing.
Securities. bank clearances, documents, deeds, corporate papers, etc., such as are bulky. These are shipped by air express wherever the rate is less than air mail.
Sample forgings.
Machinery parts and replacements.
Special jigs and tools.
Style merchandise, especially sam-

Style merchandise, especially sam-

pies.
Serums, medicines, surgical instruments, etc.
Automobile parts.
Jewelry.
Dentists' supplies.
Oil well supplies and replacements.
Department stores for Saturday morning sales.

Flowers

Forgotten articles of travelers, etc. Vegetables and fruits for special uses.

At the present time probably the greatest users are the newspaper syndicate photographers and the news reel makers. Colonial Air Transport, for illustration, tells the following:

"After the Harvard-Yale football game at Cambridge, Mass., in November, 1929, we carried as air express from Boston to New York all the films that were taken during the game and which were to be exhibited that evening as news reels in New York. In the past it was necessary for the film companies to charter a plane to rush the films to New York for showing that same evening. It is therefore a great saving to them to be able to use our air express service for that purpose."

Between New York and Boston, during 1930, there has developed "a great deal of transferring of stock certificates and bonds by air express, with use of the Western Union messenger service at both ends of the trip." The companies report that "this has been a great saving to the exchange houses because securities can be delivered before the market closes the same day."

And, in the great Southwest, one is not surprised to learn from Southern Air Transport, Inc., that:

"More oil well supplies, especially material needed for emergency repairs, are carried by our planes than any other commodity. Oil companies and independent operators have found that they can save thousands of dollars in time by using the fast air express. Since Texas is fairly well perforated by oil wells, with new ones going down every day, this source of business for us is almost constant."

Just as news reels and photographs rank first between the cities of the East, with advertising matter and mats a close second, so, as one gets into the West and Southwest, the item of most importance is parts and replacements for machinery. The aviation industry teems with stories of oil wells saved by air express, of harvesting machines repaired overnight at a time when every hour counts, of electric generating plants and steam turbines saved from costly shutdown, of factories kept running by the use of telephone toll and air express rate.

With repair parts, especially, does the air express serve a wonderful use. The replacements can travel through the air in the afternoon, be delivered in the early evening, and the plant put in readiness to run before morning. Were the part, however, sent by overnight train, the entire next day would be lost while workmen set up the machinery. For emergency shipments of this nature time is all essential; cost become secondary. The air has displaced all other means, much as, previous to this age, men were sent on limited trains with the repair part in a Pullman compartment just for

the sake of saving time after arrival of the ordinary shipment by railroad ex-

The greatest saving of time occurs where the rail time exceeds sixteen or eighteen hours. So long as a rail shipment is possible between the late hours of one business afternoon and the early hours of the following business morning, the air does not compel patronage, because, for all ordinary commodities, an overnight interval is not serious. saving in time becomes of real importance when the rail time exceeds thirtysix hours, as it is between the Atlantic and Pacific Coasts, or between the industrial East and the bustling Texas oil fields. Here the use of air transportation is growing, because usefulness is great.

Then, at the other extreme, is the most interesting use of freight by air over quite short distances. Examples are the well patronized routes between Boston and New York, New York and Albany, not to forget the heavy traffic lanes radiating from Detroit to Chicago, to Cleveland, to Buffalo and to Cincinnati. In these cases, and others of like short distance, the plane is popular because it permits delivery of goods within three or four hours. Between New York and Boston, for instance, the flying time is less than two hours, and the companies, by cooperation with the Western Union's messenger service, advertise:

Four deliveries daily in both cities. Only four hours from person to person.

Freak Shipments

EMERGENCY shipments are the stock-in-trade of air express. To rush serum and medicine to a region stricken with epidemic is an every-day occurrence. Similar to this is the rushing of a dog's head to Austin from some outlying Texas point, or from Florida to Atlanta, for laboratory examination where rabies is suspected-the purpose being, of course, to expedite proper treatment for victims of dog-bite if danger is found to exist.

Queen bees from the Rio Grande Valley in southern Texas have been transported to Wilkes-Barre; a monkey was once carried across Texas under special arrangements; a prize heifer was shipped from Detroit to Cleveland in order to be in time for a stock show; a prize sheep from Michigan Agricultural College to the International Livestock Exhibition at Chicago; a dog from New York to a show in Boston, where it won a blue ribbon; even a kitten, all fixed up with ribbons, from a grandfather to his granddaughter. These, it will be noted, were shipped despite the prohibition against live animals. Probably, if the truth were known, the companies gladly overlooked their restrictions for the publicity that was sure to follow.

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The companies report numerous cases of persons who had forgotten something when leaving a city by train. Then, when told of the air express service, they

air, to find it awaiting the train at destination.

One instance of this sort, told in Boston and New York papers last April, introduces a bit of amusement into freight by air. This account was as follows:

had requested the article to be sent by

Professor Who Forgot Trousers Aided by Air Express

by Air Express

The absent-minded professor of comic strip fame who left his trousers at home, put out the clock and wound up the cat and did similar stunts, is as extinct as the dodo bird. Yet a prominent Eoston professor realized yesterday, as his train sped to New York where he was to sail on the Aquitania, that he had left the trousers of his dress suit at home. The learned gentleman was assailed for a moment with a horrible vision of himself in frock coat and plus fours at a solemn gathering in London.

Then came inspiration. At Providence the professor sent a telegram to

Then came inspiration. At Providence the professor sent a telegram to Boston asking that the prized trousers be sent by Western Union-Colonial Air Transport service. The messenger boy who delivered the telegram at the home in Boston departed with a bundle under his arm. That bundle was taken to the Boston airport and put on board the next plane leaving for Newark Metropolitan Airport. The plane was met by Western Union messengers, as usual, and the parcel quickly delivered the ship.

When the professor went to his cabin when the professor went to his caoin the package containing the missing trousers lay on his berth, where it had been awaiting him for a consider-able time. This service had cost him

Newspapers, though far from being freak shipments, use the air express with increasing frequency. During the present summer, to illustrate, the New York Times delivers its weekday edition to seventeen principal resorts of the White Mountains. A similar service has been inaugurated to the Adirondacks, the region of Lake George and certain points in Canada. The official announcement was the following:

A saving in time of from one to ten hours is effected in airplane delivery of The New York *Times* to following points:

,	Hours Saved	Arrives (A.M.)	
Crown Point	One	9:26	
Port Henry	Two	9:10	
Loon Lake	Six	8:25	
Malone	Six	10:00	
Paul Smith's	Seven	7:30	
Port Kent	Seven	5:42	
Westport	Seven	4:40	
Cliff Haven	Eight	5:35	
Elizabethtown	Eight	4:55	
Saranac Lake	Eight	6:35	
Lake Clear	Eight	6:47	
Plattsburg	Eight	5:20	
Rouse's Point	Eight	6:10	
Keeseville	Nine	5:30	
Lake Placid	Nine	6:05	
Ausable Chasm	Ten	5:35	
Keene	Ten	5:10	

Other newspapers, throughout the country, do the same, not only for their morning editions but, even more commonly, for the late afternoon issues with sports and stock market closings. The Times, here used as example, does not

by any means stand alone, although it has in this, as in many other particulars, been alert to use the air.

In the handling of newspapers a combination is used of fast motor truck, airplane and railroad trains, but the net result is a cutting of six to sixteen hours from the former time. New York papers now reach Montreal in the morning instead of the following evening. Once such a schedule is thoroughly established, as it is in this case for the resort season, other special situations are likely to be discovered calling for plane delivery of newspapers, and, presently, the plane will come into considerable use for this purpose.

It is thus that many services develop gradually-in small ways at first to meet unusual conditions. It is thus, too, that freight by air will come into general use for many commodities. It will be pressed into service, at first, for emergencies and special situations. Then, imperceptibly, it will be fitted into our habits of living.

Rates

N^O phase of freight by air is more difficult to discuss than that of

In a general way, the rates are highhigh in comparison with ordinary express shipped by rail; high, too, in comparison with the rates for air mail for small parcels. Yet, over any route where traffic has developed in considerable volume, the rates have come steadily down. Every reissue of a tariff is apt to reveal reductions, either for the purpose of attracting business or because business has been so good as to warrant reductions.

The feeling is, everywhere, that the rates are too high to use. No greater mistake can be made by a traffic manager, for he will find that, if he offers volume with regularity, the rates will be made such as to be attractive. Rates are, as one would guess, not yet subject to regulation, and, except in rare instances, the operators have been permitted "to make their own rates."

The route between Boston and New York gives a hint, possibly, of what may elsewhere be expected. Barely a year ago (May 15, 1929) the Colonial Air Transport Co. undertook to carry freight between these two cities. They announced a flat rate of \$5 a package.

This operator quickly discovered that the economies of speed in the air were lost "on the ground"; that is, the pickup at one end and the delivery at the other absorbed much of the time saved by flying. To meet this difficulty an arrangement was perfected with the Western Union's A.D.T. messenger service. Under this plan, which is now in effect for both those cities, a shipper may deposit his parcel with any Western Union office-or merely call for a messenger

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boy, for that matter-and the shipment will go out on the first scheduled plane, of which there are four departures each business day. When the plane arrives at destination the in-coming shipments are turned over to messengers who rush the deliveries to their several addresses. Thus, with a flying schedule of 1% hours between the two cities, a shipper is assured that in "only four hours" his package will get from "person to person"-this interval being sufficient to cover the distance to and from airports.

After nine months of operation this initial rate of \$5 was voluntarily reduced to a schedule which now is:

Up to 1	lb										\$1.25
1 lb to 2 2 lbs. to	lbs										3.00
5 lbs. to	10 lbs	١.									4.00
10 lbs. te	0 15 1	lb	S			ı.					5.00

Full liability up to \$50. Additional insurance at rate of 25c. for each \$100

These rates include the messenger service.

But, in order also to accommodate those who prefer to do their own pickup and delivery, the same airplanes carry freight from "airport to airport" on a flat rate of 20c. a pound. The same rate is also available between New York and Albany, or New York and Montreal.

This arrangement for messenger service at terminals obviates the old objection to shipping by air-namely, that air express is satisfactory as long as it is in the air but that it has been slow on the ground.

We are told that the Western Union looks upon the plan in New York and Boston as an experiment. If successful. it will probably be extended to other cities. It is impressive, in this connection, to report that during the summer of 1930 this company averaged 150 shipments a day eastbound from New York to Boston. and that of this daily total, going out from New York, approximately 125 shippers utilized the messenger service and 25 attended to their own pick-up and delivery.

Elsewhere the rates, when service is inaugurated are higher than for air mail (5c. for the first ounce, 10c. for each succeeding ounce, regardless of distance, this being equivalent to \$1.55 for the first pound and \$1.60 for overweights). No sooner, however, is a service established between two cities to transport freight by air, than the rates begin to slide.

It is impossible to schedule all the rates now in effect. Yet, as showing how rates decline as business increases, we give the official table of rates of the Stout Air Lines (Ford Airways) which operate from Chicago, Detroit and Cleveland. The following rates apply "between all points"-that is, from any one to any other of those named (shipments are transferred free between airports and

central downtown concentration stations in each city, but neither pick-up nor delivery is performed):

1	lb.	32	lbs\$4.45
	to 13 lbs. \$2.00	33	lbs 4.55
14	lbs 2.10	34	lbs 4.65
15	lbs 2.25	35	lbs 4.75
16	lbs 2.40	36	lbs 4.85
17	lbs 2.55	37	lbs 4.95
18	lbs 2.70	38	lbs 5.05
19	lbs 2.85	39	lbs 5.15
20	lbs 3.00	40	lbs 5.25
21	lbs 3.15	41	lbs 5.35
22	lbs 3.30	42	lbs 5.45
23	lbs 3.45	43	lbs 5.55
24	lbs 3.60	44	lbs 5.65
25	lbs 3.75	45	lbs 5.75
26	lbs 3.85	46	lbs 5.85
27	lbs 3.95	47	lbs 5.95
28	lbs 4.05	48	lbs 6.05
29	lbs 4.15	49	lbs 6.15
30	lbs 4.25	50	lbs 6.25
31	lbs 4.35	100	lbs11.25

In Texas, where the Southern Air Transport operates, the system of rates is based on distance. Skeletonized from their latest tariff the following will convey some idea of the rates in effect:

Weight	Not Over 100 Miles	100- 200 Miles	200- 300 Miles	500- 600 Miles	900- 1000 Miles
	\$0.25	\$0.25	$^{\$0.25}_{1.20}$	\$0.48	\$0.80
10 lbs		1.60 3.20	2.40	4.80	8.00
50 lbs		8.00	12.00	24.00	40.00

For bulky packages 1/5 of a cubic foot is calculated as 1 pound; an additional charge of 50c. a package is made for pick-up and delivery, one-half that sum for either one but not both these services.

The foregoing rate would appear to be approximately 8c. a pound for each 100 miles of distance, after the lower weights are exceeded. Eight cents is an exceedingly low rate for the service, especially when it is remembered that air mail costs twenty times that amount. Eight cent a pound for each 100 miles is, however, approximately the same as the 20c. rate between New York and Boston for transportation without pick-up or delivery.

In about 200 cities of the country the Railway Express Agency has now concluded arrangements with the air operators for handling freight by air. The service is rapidly being extended, since its inception in September, 1927, with the plan of ultimately giving as wide a service by air as this Agency offers by rail. By combination, too, of rail and air for outlying points, a greatly expedited service will be available to many other, and smaller, places.

This Agency is experimenting, also, with a special pick-up service. For the present this is confined to a few cities, such as New York and Chicago, but, in all probability, for any city where volume develops, some type of past delivery will be instituted. Patrons demand handling "on the ground" comparable with the fast speed "in the air," and, for another matter, in keeping with the higher rates assessed.

The Railway Express Agency's sched-

ule of rates gives the rate for each quarter-pound from city to city. It is, of course, an elaborate table-altogether too voluminous to reproduce here. The rates vary, however, from 15c., which is the lowest, to 75c., which is the highest, for one-fourth of a pound. A pound is considered the equivalent of 50 cubic inches. The minimum charge is four times that for one-fourth pounds, which means that the minimum weight accepted for shipment is one pound. "Lot shipments" are not accepted; each parcel pays the full rate. No schedule has been announced in the published tariffs for weights in excess of one pound; that is

to say, a heavy package multiplies the

rate for one pound by its full weight.

This lowest rate, 15c., amounts to 60c. for a pound. It is applicable for short flights, such as from San Francisco to Fresno or Bakersfield; from Portland, Ore., to Medford; from Los Angeles to Bakersfield or Fresno; from Seattle to Tacoma and Portland. It is the rate for only a few routes, of which the foregoing nearly complete the list. All are on the Pacific Coast. Normally, the low rate is 25c. for one-fourth pound, or \$1 for a pound. This rate applies from Akron to Chicago, Cincinnati, Cleveland, Detroit and Louisville; from Cedar Rapids to Chicago, Des Moines, Lincoln, Omaha and Iowa City; from Cleveland to Akron, Chicago, Columbus, Dayton, Louisville, Toledo, Newark (N. J.) for New York. The 25c. rate, however, does not generally obtain in the East. There the rates

The highest rate of the Railway Express Agency applies from Coast to Coast, such as from Boston to California points, it being 75c., or \$3 for a pound. From New York to the Coast the rate is 65c., or \$2.60 for a pound, that being also the rate from Pittsburgh and Cleveland to the Coast, and, in a general way, the rate from the East to either the Rockies or California and the Northwest.

Thus it will be seen that rates for freight by air vary widely. They are more complicated than railroad freight rates, bearing, to all appearances, no relation to distance but being merely the first efforts of transportation companies to find a rate which will do two things: (1) get the most the traffic will bear, and (2) yield a profit.

Again must we emphasize the point that wherever business has developed, the rates have come down. Rates, too, are changing almost overnight and they are far from fixed, even when published.

Filing

FREIGHT by air presents a new duty to the traffic manager. He now must compile a new set of rates and build up another file.

The first duty is to acquaint himself with the routes in service. This applies

Its Economic Relation to Public Warehousing

not only to the vicinity of his factory or branches but, equally, to any place in the country where shipments are made. It applies, as well, to Canada, where flying is developing and where the Canadian Pacific Express Co. is attempting to make contracts with all flying operators for the carrying of express by air.

Inasmuch as "time on the ground" is quite as essential as "time in the air" it hardly suffices to have a schedule of flying time. In order to utilize the air for goods a manager must know where to reach the air carrier—whether it is necessary to get a shipment to the airport or whether some downtown depot has been established for the purpose. If a pick-up service has been instituted, or a delivery service at destination, these are vital items of information.

Reading the tariffs, for another matter, is different from the familiar railroad tariff. While not at all difficult, to understand the tariffs and all their new symbols does require patience and experience. For one matter, as railroads do not operate all services on Sundays, so with the airways Monday is the "dead day." Many of the routes suspend flying on Sunday for passengers, on Monday for mail and express. Some do not fly Saturdays. More important is it to remember that new lines are being established, and, quite as often, old routes discontinued because they have run into financial difficulties.

Of "guides" one should be mentioned. The "Official Aviation Guide" is issued from 105 West Adams St., Chicago, monthly, \$5 a year. It gives "accurate and authentic information of the passenger, mail and express air lines" both for this country and all of North and South America. This guide follows the familiar make-up of the Official Guide of the railroads, with time tables, flying time between points, rates both for passengers and express matter, and, in the general index of towns, the air mileage from each town to all places with which it enjoys service, followed by the rate of fare and the flying time. Into this publication has just been absorbed (as of July) another "guide" known as "Air Travel Guide."

"Airline Rates and Routes," formerly issued from 1265 Broadway, New York, also has been consolidated with the "Official Aviation Guide."

Looking Ahead

JAMES C. WILLSON of Curtiss-Wright Corporation has recently put himself on record by saying:

"Within the industry we have been making a thorough nation-wide investigation into the volume of business which the large industries would ship by air if rates were reasonable. The question of rates is vital in determining how much of the country's volume of express will

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go by air. The results of our study have been amazing.

"Speed of delivery, and reduction of stocks at warehouses, have come to be controlling operations with all progressive business concerns, and this accounts for the huge volume of material shipped daily by railroad express. Although express is admittedly more expensive than freight, it proves cheaper in the end. The introduction of an efficient and nation-wide air express will provide a still faster transport system, and we can say with certainty, on the experience of the railroads, that there will be another given volume of shipments which will pa ya slightly higher premium for the still greater speed of air transportation.

Or, jumping half way across the continent to Texas, we receive from Victor Grima, traffic manager of the Southern Air Transport Co., the following forecast:

"The volume of air express at the pres-

ent time is limited. All the reputable large operators are working toward the inauguration of a system of air express, with coordinated and connecting schedules and tariffs over all existing air lines so as to serve any point in the United States. Also, the problem of pick-up and delivery service between airports and business sections of the cities must he standardized

"The problem of special express planes, carrying maximum loads, with plenty of space available, and maintaining a speed of 100 miles per hour, is one toward which the manufacturers of aircraft are directing untiring efforts.

"Until these things are accomplished, no appreciable volume of air express can be expected."

In all probability, too, passenger traffic by air will increase automatically as business houses of the country become more and more familiar with air schedules and operations by air. As they ship freight by air, much of the strangeness of air travel will evaporate. Familiarity and use will transform novelty into The manufacturer who finds he can ship merchandise from Pittsburgh to California in 24 hours will be the first to wonder why his sales manager does not make the trip in the same length of

Distance, after all, is more a matter of time than of miles. We think of Pittsburgh and San Francisco being far apart because it has always taken five days to make the trip. With air transportation, for the past year and a half. that time has been cut to one-fourth of five days for a passenger and one-fifth of the same interveral for mail and freight. This means that commercial development will not involve the time element as it has in the past. It means that Texas, as well as the Pacific Northwest, will cease to be five days away but will be thought of as "second morning delivery" from all eastern points.

"Canopy Dry"—Something New for Protection of Goods Against the Elements

Something relatively new of interest to warehousemen and shippers is "canopy dry," produced by the General Mill Equipment Co., Kansas City, Mo. It is a scientifically constructed frame of sturdy galvanized tubular steel covered with high grade waterproof canvas, designed to protect goods from the elements. It is easily and quickly attached to any car door opening, is made collapsible for easy handling, and its cov-

ering may be replaced whenever desired. It is adjustable to any height preferred, and there is also a 24-inch lateral adjustment provided for movement inwardly or outwardly from car door opening. The standard dimensions are 5 feet long, 5 feet wide and 7 feet high and the total weight is 40 pounds. The price is \$50, with a quantity price quoted on application, f.o.b. Kansas City. Special sizes

are made to order.



Upper left, light and compact. Upper right, easily attached. Lower left, showing extension four feet past car door. Lower right, showing use from car to car

"Canopy dry" is intended to keep shipping rooms warm and dry, protect merchandise from rain and snow, help avoid accidents, and cut loading costs. The frame can be set up or taken down in 60 seconds by one man, as compared with the time required for preparing a homemade loading shelter.

"After observing the enormous damage done each year to merchandise, due to its becoming wet while being loaded into and from cars in stormy weather," says an explanatory statement by the manufacturers, "and the time wasted in postponing the loading of cars during severe rain storms, and many cases of personal injury to employees, due to snow and ice on platforms where cars are being loaded, the inventor set about devising a practical, economical means of preventing these expensive difficulties. The result is a device which promptly eliminates all possible chance of damage to merchandise and makes it possible for workmen to speed up loading work in dry, safe surroundings, even though the roof of the loading dock does not extend over the car.'

New Firm in Kansas City

The Walnut Storage & Distributing Co. has been incorporated in Kansas City, Mo., and has taken a lease on the entire Kellog Building, a five-story fireproof structure at 2020 Street.

B. Z. Harty, president, formerly was manager of the Car Terminal Warehouse Co., Detroit, and more recently was vicepresident and general manager of the recently-disbanded Service Warehouse Co. F. K. Tutt, vice-president, was for forty-three years with the Missouri Pacific Railroad's freight department. A. W. Mackie, secretary-treasurer, is president of the D. J. Mackie Transfer Co. and a director of the Kansas City-Missouri River Navigation Co.

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Public Hearings to Be Held in Barge Line Competition Case

American Warehousemen's Association Has Declined to Have Case Handled Under Shortened I. C. C. Procedure, with Result that Complete Inquiry Will Develop Fullest Information

By George H. Manning

 $(By\ Telegraph)$

Washington, Aug. 12.—Interstate Commerce Commission today announced Sept. 30 as date for hearing on complaint of American Warehousemen's Association against Inland Waterways Corporation. Hearings will be held in Memphis, Tenn., before Examiner Maidens.

-George H. Manning.

DISTRIBUTION AND WAREHOUSING'S Washington Bureau, 1163 National Press Building.

products of grain, which leave points of

origin or intermediate transit points as

manufactured products, for concentra-

tion at the storage point into outbound

shipments, in straight or mixed carloads,

transcends the legitimate function of

transit. We find that storage-in-transit

of the kind described is unreasonable

and unduly preferential and prejudicial."

Commission tightened up on transit

Furthermore, in this decision, the

and not for further

EFORE the Interstate Commerce Commission fixed a date for hearings, it was decided that a full and complete investigation of the warehousing practices of the Inland Waterways Corporation should be had. Formal complaints have been filed against these practices by the American Warehousemen's Association (Docket No. 23510) and the association has declined to have the case handled under the shortened procedure of the Commission.

The Inland Waterways Corporation, operating company of the Federal Government's Barge Lines, had informed the Commission that it was agreeable to having the complaint handled under the shortened procedure, which eliminates public hearings. Had this plan been followed, the parties to the controversy would have submitted their evidence in writing and the Commission would have heard oral arguments before rendering a decision.

> practices which long had been established in the grain trade. The Comdiscussion of the subject clearly indicates acceptance of the view that grain shippers having no occasion to avail themselves of the transit privileges were not getting a fair break when they paid the same freight rates as were paid by shippers using transit privileges.

In other words, the discussion in the grain case appears to accept the view that like service calls for like rates and that the shipper who gets something in the way of service for nothing is able to have it only because other shippers

grain case may not be the conditions which apply to warehouse storage-intransit for Barge Line shipments, the principle of like service and like rates for the service for all shippers is as

While the public hearing procedure takes more time, it is the more satisfactory in handling important cases, as it affords full opportunity for the cross-questioning of wit-Too, the regular procedure tends to give the public the fullest information—and in this particular case, in which the "public," through taxation, has provided millions of dollars for the Barge Line activities, wide publicity on the "facts in the case" is singularly desirable.

It is apparent that this case, which involves the storagein-transit practices and charges of the Barge Lines, is attracting attention. Chambers of Commerce in Dubuque, Ia., Kansas City, Mo., Mobile, Ala., and other river ports, already have written the Commission requesting that they be kept advised on the case. Many members of Congress also are keeping in touch with it, and their interest suggests the possibility of corrective legislation in the event that the Interstate Commerce Commission finally decides that the Government Barge Line has done no violence to the transportation law.

WHILE transit storage of grain, as privileged by the railroads, is not on all-fours with the warehouse storage mission's provided for some shippers by the Barge Line, there are those who attribute importance to the Commission's recent decision in the western grain rate case, one of the most important cases handled by the Commission since the War. decision the Commission held: "Storage-in-transit of manufactured

processing.

pay a part of the cost of the service. Although conditions applicable to the sound under one set of conditions as under another. The injustice of any deviation from the principle is so obvious, and the economics of it so unsound for both shipper and carrier, that it is difficult to understand the reasoning by which the Inland Waterways Corporation officials justified the initial departure.

The Inland Waterways Corporation filed its formal and perfunctory answer to the two complaints drawn against it by the warehousing interests. It admits being a common carrier by water, and nothing more, and, therefore, offers no justification of its free storage arrangements and no indication as to how general the arrangement is. It enters a blanket denial to the charges that its practices and charges in connection with storage-in-transit are in anywise unjust, unreasonable or unlawful.

The original complaint of the warehousing interests dealt principally with

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A supplemental complaint filed in July brought canned goods and coffee into the case. The allegation is that "the said schedule [of the Inland Waterways Corporation] accords special or free and reduced storage-in-transit rates, charges, rules and regulations, including drayage absorptions and allowances to shippers and consignees storing in warehouses owned or operated by the Inland Waterways Corporation and warehouses directly adjacent to Barge Line wharves, on shipment described, and moving in interstate commerce and transportation via said Inland Waterways Corporation, while denying and refusing to accord similar special or free and reduced storage-in-transit rules, rates, charges, regulations and practices . shippers and consignees of similar shipments transported via the Inland Waterways Corporation when stored in the warehouse operated by the complainant's members, to the undue prejudice of shippers represented by complainants and complainant's members, and giving an undue preference to shippers and consignee storing in warehouses owned or operated by defendant, or in warehouses adjacent to defendant's wharves." (See Distribution and Warehousing issues of July and August.)

If the technicalities of the case permit judicial consideration of the demoralization worked by the Barge Line in the warehousing industry, the evidence will be decidedly convincing. In such river ports as New Orleans, Memphis, and St. Louis, continuation of the Barge Line practices means retrogression for the privately-owned warehousing industry from a major to a minor activity—a prospect scarcely reconcilable with the general public interest.

As was pointed out in the August issue of Distribution and Warehousing (page 13) by Horace Turner, president of the Turner Terminal Company of Mobile, the Barge Line is following precedents established by the rail carriers in this matter of warehousing at ports; and, as long as the practices are engaged in by either or both carriers, the privately-owned warehouse will continue at a disadvantage

The McDuffie bill introduced in the last session of Congress was a proposal "to amend the Interstate Commerce Act, as amended, to require separate valuation of terminal facilities and a reasonable return thereon." As the public hearings on the warehousemen's complaint against the Barge Line are to be held before next December, when Congress convenes again, there is the lively possi-

bility that the evidence may influence Congress in its consideration of the Mc-Duffie proposal.

The Barge Line has been the "favored child" of Congress on which has been lavished riches and privileges. The reason for this, of course, is apparent: The States in the Mississippi Valley are determined to have relief for the high freight rates if such relief can be had through improvement and use of the Mississippi, Ohio and Missouri Rivers and their major tributaries as waterways. At first the attitude seemed to be

"river transportation at whatever cost" and regardless of the consequences on related activities. Recently, however, there has been an appreciable change in this attitude to one that has a more discriminating regard for privately-owned services on which, heretofore the shipping public has had to rely. With the exceptions which prove the rule, these services have met the public needs. That they should not now be seriously crippled, if not ruthlessly destroyed, by a Government experiment, is a conviction entertained by an ever-increasing number of members in Congress.

Even the ardent supporters of the Federal Barge Line assert that the time will come when these water transportation facilities will be sold to private owners. If and when that happens, if present warehousing practices are continued, we will have one group of private interests operating water carriers attracting business by virtue of free storage-in-transit, or storage at less than the out-of-pocket cost; while another group of private interests, in the business of warehousing, will be competing, but with no transportation lines in the freight charges of which they can recover losses incident to storage services rendered at less than cost.

Thus the case against the Inland Waterways Corporation, growing out of the complaints of the American Warehousemen's Association, already has taken on important proportions. It may prove to be the beginning of agitation that will lead to legislation which may work some rather fundamental changes in the legal relationships between both rail and water carriers, and independent activities such as warehousing, hauling, etc., which necessarily contribute importantly to the efficiency and economy of the distribution system.

New Mississippi Barge Line Won't Do Warehousing

ON the theory that a transportation agency has no right to engage in the public storage business, the Mississippi Valley Barge Line Co., recently authorized by the Interstate Commerce Commission to operate a barge line service between Cincinnati and New Orleans and intermediate points, will refrain from doing a warehouse business. Such assurance has been received by Jay Weil, vice-president of the Douglas Public Service Corporation, Inc., New Orleans, from officers of the Mississippi Valley Barge Line Co.

This clears the atmosphere, from warehousing's viewpoint, with regard to the scope of operations of the Mississippi Valley company, which is the first important privately owned barge line organization created under the provisions of the Denison Act.

H. B. Smith, traffic manager of the Mississippi Valley company, wrote to Mr. Weil, on June 12:

"We will perform only the duties of a common carrier and not those of a warehouseman." In reply, Mr. Weil wrote:

"It is very comforting to learn that you intend to perform only the duties of a common carrier and not those of a warehouseman. That attitude will earn the praise and commendation of our entire industry—an industry that is closely linked with transportation."

Subsequently Mr. Weil wrote to Carl J. Baer, vice-president of the Mississippi Valley Barge Line Co., outlining ware-housing's position as follows:

"The public warehousemen of this country have suffered so bitterly as a result of the free storage and other inequitable practices of the Federal Barge Line that they cannot help but be suspicious of a new system of waterway transportation unless and until they are reassured on this question of competition with a common carrier...

"The public warehousmen located along the Mississippi and Ohio rivers and tributaries handle thousands of carloads of freight every day and their indications as to the dependability and service rendered by the carriers is accepted without question by shippers and receivers of freight."

Under date of Aug. 1, Phil G. Safford, assistant to the president of the Mississippi Valley Barge Line Co., wrote Mr. Weil that "we will not provide any storage whatever as we believe a transportation agency has no right to engage in that business." He added:

"We have no space nor will we have, and the idea of warehouses incidental to business by either barge or rail carriers is wrong legally, under the doctrine of *Ultra Vires*. . . This company positively will not do a warehouse business. This has been my idea as well as Mr. Childress', our president."

Following this correspondence, Mr. Weil wrote to Distribution and Warehousing under date of Aug. 8.

"In my humble judgment every member of the American Warehousemen's Association and every one connected with or interested in the public warehouse industry of this country should fall in behind the efforts of the Mississippi Valley Barge Line and help the officials of that company to make the project a success.

"Here we have what we have been talking about and fighting for for many years—namely, inland waterway transportation financed with private capital.

"Private enterprise, you will observe, has pledged itself to do what the Federal Barge Line has persistently and consistently refused to do. It has come out openly against combining a transportation business with a public warehousing business to the detriment of our industry and if there is any way that the public warehousemen of this country can support the Mississippi Valley Barge Line, it is my opinion that they should unhesitatingly and aggressively do so. Here is a real infant industry run by taxpayers who are risking their hard earned money in legitimate and open competition with other carriers by rail and water.

"Shall we stand by and see this enterprise injured through competition with the Federal Barge Line, a non-taxpaying

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institution, financed with Government

The Interstate Commerce Commission, under its authorization to the Mississippi Valley Barge Line Co. to operate, directed that connecting rail carriers should establish, by Oct. 1, through rates and joint rates with the new line, on classes and various commodities between points in central territory and southern and southwestern territories.

The new company proposes to establish through barge-rail and rail-bargerail routes by way of Cincinnati between points in central territory, including Illinois and southwestern Wisconsin, and New Orleans and points in southern territory usually served by all-rail routes.

The only objection to establishment of the new water service was made by the Southern Railway, which contended that the public convenience and necessity does not require the establishment of a water service on the Ohio and Mississippi Rivers, for the reason that such line would open up no new territory and originate no new traffic, "but would depend upon tonnage which it would take away from the Southern Railway System and other carriers.'

Extracts from the Commission's report follow:

"The applicant has a capital stock of

\$3,000,000 fully subscribed and plans to increase this by \$500,000 in the near About \$1,500,000 has been paid in and the balance will be called as it is needed. It does not expect to issue any bonds or equipment trust certificates. Applicant has under construction four steam towboats of 2000 horsepower each with tunnel-type screw propulsion and 50 barges each of 300 tons capacity. It also has six 175-ton barges.

"Applicant is building a river-rail terminal at Cincinnati at a cost of \$400,000 for building and equipment and \$130,000 for land. At New Orleans it will use the public docks. Applicant has not as yet provided itself with terminal facilities at intermediate ports, but plans to do so in the future as expansion of its traffic may require. For the present, it will serve only Cincinnati and New Orleans, and it intends to operate regular weekly service between the two ports for high-grade as well as low-grade freight. The running time is estimated at 6 days southbound and from 12 to 14 days northbound.

"Applicant estimates that there is ample potential tonnage in the regions bordering on the waterways which it will use to insure profitable traffic, for its service. It refers to a survey made by the United States Department of Com-

merce in June, 1928, showing potential tonnage of 6,638,766 tons of bulk freight annually between New Orleans and Pittsburgh, Pa., and intermediate points. Nearly half of this consisted of iron and steel products, and much of the remainder was made up of low-grade commodities, such as lumber, coal and coke, brick and other clay products, coal tar and creosote, petroleum products, and ores and concentrates.

"From the testimony of numerous representatives of shippers who indorse applicant's project it appears that there is likelihood of a substantial volume of southbound tonnage of wrought iron pipe and other iron and steel products originating at Youngstown, Ohio, and other points in the same district; soap. manufactured iron and steel articles, paper products, prepared roofing and similar commodities, and office furniture from Cincinnati and nearby points; and glassware from Columbus, Ohio. The principal northbound traffic would consist of vegetable oils, sugar, coffee, canned goods, scrap iron, spelter, rags, and waste paper."

The president of the Mississippi Valley Barge Line Co. is L. W. Childress. president of the Columbia Terminals Co., St. Louis.

Chicago's Great Merchandise Mart Combines Warehousing, Distributing and Displaying

W HEN one considers the massive bulk of Chicago's Merchandise Mart as it stretches for 575 feet along the north bank of the Chicago River, covering a land area of 215,000 square feet and erected at a cost of \$35,000,000, one is amazed at the immensity. Here, in what is today considered the world's largest

building, have been brought together thousands of mercantile leaders to display their wares to the merchant buyers of the universe. The structure is another instance of the exercise of air rights, as it surmounts the tracks of the Chicago & Northwestern Railway.

On the display floors are sales cor-

ridors 650 feet long-business boulevards, so to speak-along both sides of which are the displays of hundreds of lines of merchandise, visible through twenty-seven miles of windows. display floor has a gross space of 217,000 square feet, while the total floor space in the entire building is close to one hundred acres.

However, there are other features in this gigantic mass of stone, iron, concrete, lumber, piping, wiring, and what not, which it took more than 3000 men nearly two years to build. There is probably something of interest to executives of every conceivable industry.

Although the Merchandise Mart is primarily an immense "sales room"-that is, a wholesale display house-there are nevertheless some features that should be of interest to the progressive warehouseman. Not only is the building close or adjacent to transportation-it is literally penetrated by it. Aside from a private freight terminal, maintained by the railroad—a two-track platform siding having a twenty-car capacity-there is trackage running directly through the site to serve manufacturing plants and industries along the river bank and

area of 120,000 square feet is back of a concourse 45 feet wide by 900 feet long. This concourse is completely in-

the distant lake front. A loading and unloading platform (Concluded on page 52)



Chicago's Merchandise Mart, erected at a cost of \$35,000,000

HOW'S BUSINESS?

CHARTED BY UNITED BUSINESS PUBLISHERS, Inc.

HIRTY-FOUR ECONOMIC EX-THERTY-FOUR ECONOMIC EX-PAPERS PUBLISHED BY THE United Business Publishers, Inc. -HERE PRESENT A COMBINED OPINION ABOUT THE COURSE OF BUSINESS DURING THE MONTH OF SEPTEMBER, GOVERNMENT AND OTHER RECORDS PROVIDE YOU WITH HISTORY OF RECENT MONTHS. THIS BOARD OF EXPERTS DEALS ONLY WITH THE FUTURE. ITS OPINIONS ARE BASED ON CLOSE CONTACT WITH THE MORE THAN 400,000 SUBSCRIBERS REACHED BY THEIR PUBLICATIONS IN FAR - FLUNG FIELDS OF RETAILING AND INDUS-

A GENERAL disinclination to buy has largely defeated any stimulation that might have been anticipated from price selling, and on many merchandising lines colder weather rather than economic improvement will increase retail trade.

The scarcity of rentals in comparison to the number of houses for sale reflects the general public's reluctance to enter long-term commitments and indicates some continued feeling of uncertainty among labor and salaried classes.

There is a tendency, as displayed by the automotive industry, to use the psychology of innovations in new goods in the hopes of tempting better buying, but the majority of manufacturers are pursuing a conservative policy of watchful waiting.

Responsibility for continued depression is being placed by many on world conditions. Impartial observers comment on the American situation as largely a result of stimulation of nonessential consumption that cannot be maintained by our present net-wage scale.

With vacation seasons over and relief from general hot weather and a relaxation from the acute drought conditions, September should, however, be a month of definite recuperative progress.

THE COURSE OF BUSINESS FORECAST FOR NEXT MONTH

BUSINESS	SALES	RETAIL STOCKS	COLLECTIONS	COMMENTS	
Passenger cars 20% less, trucks 10% better in Sept. than in Aug. Passenger cars 25% to 30% less, trucks 13% less than Sept., '29.		Passenger cars 5% greater, trucks slightly less in Sept. than in August. Both lower than Sept., '29.	Passenger car collections about the same, trucks better in Sept. than in August. Both slower than Sept., '29.	New passengar car mod els expected to boos sales only to a limite extent. Agricultural sit uation will reflect or truck sales.	
DEPARTMENT STORES	Sales in September about same or slightly less than August and 6% to 8% under Sept., '29.	About the same in September as in August, and about 8% under Sept., '29.	Will continue about the same in September. Noticeably slower than Sept., '29.	Price selling is not being found especially effective as a stimulant.	
September should show very perceptible increase over August, but some- what less than Sept., '29.		Little change in retail stocks which will be somewhat under Sept., '29.	Should show improve- ment—but slower than Sept., '29.	Fall repairs and replace- ments should begin to accelerate seasonal up- turn after dull summer months.	
Life insurance about same, fire and casualty better in September than in August. Better outlook in all lines than in Sept., '29.			Collection situation is improving in all lines.	Increasing activity in in- dustry. Should show a favorable reflection in- premium incomes and new business.	
JEWELRY.	On a par with August or slightly larger in September—but below Sept., '29.	Larger in September than in August—but be- low Sept., '29.	Anticipated improve- ment in September over August—but slower than Sept., '29, except in the far Southwest.	This industry has weath- ered conditions better comparatively than some of the necessity lines.	
MACHINERY METAL PRODUCTS METALS	Steel production should run about 65% of capac- ity in September, and considerably under Sept., '29.			Larger pipe orders and fair volume of structural steel and reinforcing bat tonnages being main- tained.	
PETROLEUM (Gasoline)	September will show decrease of about 4.6% from August — but increase of 7% over Sept., '29.	Decrease of about 9/10% in September over August with an increase of 24.9% over Sept., '29.		Stabilization of produc- tion promises recovery of portion of present profit losses during last half of year.	
PLUMBING AND HEATING	Improvement noted in residential construction with continuance of satisfactory volume along industrial lines.	Purchases based largely upon immediate needs.	Fair.	September business should show definite improvement.	
SHOES	Slow progress expected in September. As many pairs sold at retail as Sept., '29, but at lower prices.	Slight increase in stock in September—due to introduction of fall merchandise—15% under Sept., '29.	Collections about 30% off Sept., '29. Shoe industry fortunately not an extensive credit trade.	Colder weather influence, rather than economic, will start fall season.	

"Star" Your Company's Free Listing in the 1931 Warehouse Directory

Presence of the Boldface Symbol After a Firm's Name Will Attract Additional Business. Storage Executives Are Urged to Notary the Information Sheets to Reach Them in September

BY KENT B. STILES

A NEW YORK traffic department which has charge of the job of nationwide distribution of candies, chemicals, drugs, insecticides, oils and various proprietary agencies—commodities commonly found in public storage—is sending out some hundreds of carloads of those goods between late August and the first of the coming year.

On the desk of the traffic manager is the 1930 edition of the Warehouse Directory which was published as part of last January's issue of *Distribution and Warehousing*. The Directory is being used, exclusively, as the reference book in the selecting of the warehouse companies which are to store and distribute the several hundred carloads.

Also exclusively—and this is germain to the subject of this editorial article—the warehouse companies being chosen are ones which, first, advertised in the 1930 Warehouse Directory; and, second, have the boldface STAR (thus: *) after their names in their listing in the Directory. An advertising-and-STAR combination receives preference.

THE Cleveland Tractor Company, Cleveland, wrote early this year to the general manager of a merchandise warehouse company in a central western city, with regard to the Cleveland Tractor Company's use of the Warehouse Directory:

"We have never considered any warehouse where this star has not appeared."

The warehouse company's listing in the 1930 Warehouse Directory was not STARRED. The general manager had assumed that it would be by reason of the fact that his firm's listing in the previous year's Directory was STARRED, and therefore he did not support his 1930 Directory information with the affiffdavit necessary once more to earn the STAR. And so, after the Cleveland Tractor Company had called the general manager's attention to the absence of the STAR, the general manager wrote frankly to Distribution and Warehousing:

"Undoubtedly you will be interested in knowing the value placed on the * listing, and we have a greater realization of the value it is to us than at any time before."

The general manager's letter is reproduced on the opposite page.

DISTRIBUTION AND WARE TOUSING submits that the foregoing two incidents are pertinent and significant. They provide food for thought.

And they have here been set down, in this September issue, because during September the publishers will begin the task of mailing, to warehousemen everywhere, the sheets on which the storage executives may place such information as they will want to have appear, without cost, in the 1931 Directory—the coming year's reference volume which, to be issued in January, will be consulted throughout 1931 by warehousemen exchanging shipments; by traffic and sales managers making shipments; by bankers scrutinizing the consignees of shipments; by insurance company executives who will have the say as to which storage companies shall receive employees' shipments; and by other business men who will be in the position to direct shipments.

As during this year and in the past, the STAR will in 1931 mean something! Its presence or absence, after the name of a warehouse company listed in the forthcoming Directory, will be noted—just as the New York traffic department mentioned is noting it when making shipments at the present time, and as the Cleveland Tractor Company noted it.

The phrase "It's the STARRED listing that gets the business!" was coined several years ago in connection with the preparation of each year's Directory. It is not a trite phrase. It is backed by evidence, by letters, by verbal testimony.

Every warehouse executive, then, receiving—as he shortly will—the 1931 Directory Information Sheet, is earnestly urged to have the information notaried before returning the sheet to Distribution and Warehousing.

The *notaried* information will assure a STAR in the 1931 Directory. The STAR will be a favorable factor in the securing of business during 1931. A combination of advertising and STAR will be even more important.

ALLUDING again to the experience of the warehouse manager whose letter is herewith published, emphasis is timely to the effect that each listing to appear in the 1931 Directory must be notaried after Sept. 1 of this year, 1930, if the new listing is to be STARRED.

The 1931 STAR will signify not only that the information in the listing has

been notaried but that the date of the act of notary was during the few months preceding the issuing of the Directory.

In other words, a 1930 STAR will not carry over into 1931. All information, even though it may have been notaried once before, should be notaried again, to earn a 1931 STAR, even though its exact phraseology be unchanged.

If this seems at first blush an exacting and superfluous policy, it should be kept in mind that the publishers are striving toward an ideal—that the Warehouse Directory may be recognized each year as wholly dependable because of presenting information which is not only factually correct but up to date. A Directory which does not somewhere nearly

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Testifying to the Importance of the STAR:

O^N April 29, 1930, H. S. Webster, Jr., secretary of *Distribution and Warehousing*, received the following letter from Frank M. Cole, general manager of the Radial Warehouse Co., Kansas City, Mo.

Dear Mr. Webster:

Early in the year, or about the time we received the 1930 annual warehouse directory number, we complained that our listing was not starred as it had been in recent years. We found that we were responsible for this as we had failed to send in the required affidavit, having taken for granted the fact that our warehouse had been starred in previous years was sufficient to carry over every year.

You will undoubtedly be interested in knowing how the lack of the starred listing was brought home to us not long since. The Cleveland Tractor Company, Cleveland, Ohio, with whom we were in communication relative to warehousing, stated that they noticed that the outline of our company as contained in *Distribution and Warehousing* did not show the information to have been given in sworn statement. We sent them the correspondence we had with your office that indicated the situation as developed above and received the following:

"The correspondence relative to your sworn affidavit is very interesting and it is returned as requested. We are glad to note your attitude in the matter and furthermore desire to quote our opinion which is to the effect that we have never considered any warehouse where this star has not appeared."

Undoubtedly you will be interested in knowing the value placed on the * listing, and we have a greater realization of the value it is to us than at any time before.

The foregoing letter speaks for itself. "It's the STARRED listing that gets the business!"

approach that ideal is, obviously, value-

The Directory consultant is entitled to the publishers' assurance that STARRED information was notaried, not last year or in 1928, but late in 1930 specifically for the Directory which he consults when doing business in 1931. When he knows that the 1931 STAR means that listings are supported by affidavits that are recent and not several years old, his confidence in the trustworthiness of the Directory is increased. A Warehouse Directory not trustworthy is something, certainly, which its publishers and the warehouse industry will not want foisted on Business America.

Information Sheets

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THE 1931 Directory Information Sheets shortly to be circulated among the warehousemen will be in two forms.

1. Those companies which have representative listings in the 1930 book will each receive its listing pasted to a sheet which will have at its foot a notary text to enable a responsible officer of the company to swear to the correctness of the information set forth in the listing. This sheet will have ample marginal space which will provide room for any changes which the officer may wish to make in the listing.

2. Those companies which have no listings in the 1930 Directory, and those with scant listings which are not representative of their business, will each receive a questionnaire. This, too, will carry a notary text at its foot. From the information set forth on the returned questionnaires, listings will be prepared for the new Directory.

When the notary spaces are properly filled in and sworn to, the information so attested will earn the vital STAR.

If the notary spaces are not properly

filled in and sworn to, the information on the sheets will be listed, but there will be these exceptions: (a) No STAR will be published; (b) investment figures will be eliminated; (c) area, either square feet or cubic feet, will be eliminated.

In other words, only listings supported by affidavit will carry a STAR and include investment and area figures. And to the shipper selecting warehouse consignees, the STAR, the investment and the area are three important considerations when making decisions.

Companies which, listed in the 1930 Directory, make no returns of their 1930 listings sent them for revision and approval for the 1931 book, will each receive from the publishers a special letter stating that unless a return is made, the listing will be dropped entirely from the 1931 Directory. This new policy will tend to eliminate the inclusion of firms which have gone out of existence since the 1930 Directory appeared last January.

Symbols

ASSOCIATION officers guard jealously, and rightly so, their association symbols—such as AWA for American Warehousemen's Association, NFWA for National Furniture Warehousemen's Association, CanS&T for Canadian Storage & Transfermen's Association, etc.

As in the last, every effort will be made to see that no company's listing will carry, in the 1931 Directory, any association symbol to which the company is not entitled by reason of membership in that association.

To this end the secretaries of all the industry's associations — n a t i o n a l, regional, State and local—are asked to send up-to-date membership lists. These lists are carefully checked against the

returned information sheets, and discrepancies are called to the attention of the companies and of the association secretaries.

The association secretaries are accordingly requested to respond promptly to the request for latest lists. Only in that way can an association secretary protect his organization against mistakes in the inclusion of association symbols in companies' listings. If an association secretary does not supply such an up-to-date list, symbols will be included in the listings, if found on the information sheets, inasmuch as the directory publishers will not be in a position to do the desired checking in the interests of the associations which have not sent the membership lists.

Promptness

WAREHOUSE executives are requested to make prompt return of the 1931 information sheets. It is a tremendous job, involving expenditure of thousands of dollars, to prepare and publish this annual reference volume. After a certain time, if returns are not received, it becomes necessary to make a second mailing. Experience has shown that to some firms it is necessary to send out a third mailing. This is manifestly unfair to the publishers. It means extra postage, stationery, labor. Early cooperation is urged.

New Corporation in Kingston, N. Y.

The Wiltwyck Holding & Trading Company, Inc., Kingston, N. Y., has been chartered with \$100,000 capital to conduct a storage warehouse business. The directors and subscribers are James A. Dwyer, Lowell S. Brooks and Charles W. Merrill.

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A Review of the LaSalle Course in Traffic Management*

ASALLE, Alexander Hamilton and Scranton represent the three great home study schools of popular education in this country. "Home study" as conducted by LaSalle—and of course by other reputable institutions—is far more than "correspondence" work, because the effort is consistently made to give a training equal in standards to that of a university. The elaborate social life, the fraternity and hazing spectacles of college life, are wanting, but to the conscientious student who takes the course without faking his written lessons the resultant training is fully the equivalent of that of many a college course.

To this end, the three institutions named solicit the "memsership" of (1) men engaged in business who desire to supplement the lack of early training by studying at home, and (2) of those who feel the need of special schooling for the purpose of obtaining a better position.

The courses offered by these three, accordingly, aim to be exceedingly practical. They are utilitarian. They hold out promise of immediate advancement on the job, bigger pay, more usefulness—tangible returns for evenings deTurning thought, now, to LaSalle's course in traffic management, it is pertinent to remember that this course was one of the first put out when LaSalle Extension University was organized. For just twenty years traffic men have now had the opportunity herein offered, and, unless this reviewer's memory is at fault, until the year 1916 no other organized traffic course was in existence. In fact, the outstanding success of this course in traffic management has contributed largely to the fine reputation of the entire LaSalle program. Other home study courses, from other schools, have been available for such subjects as business management, accountancy, law, salesmanship, banking, personnel management, foremanship, credits and

voted to study and for dollars paid for the training.

but LaSalle, to many a traffic man, stands distinguished for its course in traffic management, together with the supplemental courses in station management, telegraphy and railway accounting.

collections, business correspondence and letter writing, etc.,

L ASALLE'S course of study in traffic has, on many occasions, been revised. In 1926 a completely new and greatly expanded course was undertaken for the purpose of presenting the changed conditions of traffic and transportation in post-war years. It is probably safe to aver that a new course was issued in 1926

The former course consisted of 25 texts, 10 reference books, and 36 sets of practical problems. The present service contains 69 texts or "manuals," considerably more reference material, and 68 sets of practical problems. The former course was designed for a year of work, whereas the new one requires 68 weeks and demands of the student that he study rather more than twice the quantity of material.

In preparing the new course many new subjects have been introduced—ones which a graduate of the former course wishes he might have had in his day. They are such as traffic geography, kinds of rates, kinds of tariffs, railroad freight rate guides, railroad overcharge claims, marketing of transportation ser-

DISTRIBUTION and Ware-housing has received from LaSalle Extension University copies of five new manuals in the LaSalle Course of Traffic Management (Nos. 1, 2, 3, 55 and 61)

Inasmuch as this course of study has never been adequately reviewed on our pages, H. A. Haring, this magazine's contributing editor, has prepared the accompanying outline of the work as a whole.

vice, industrial transportation facilities, shipping by mail, Governmental regulatory bodies, together with many new phases of rate making and rate cases.

The five volumes just off the press we take to be evidence that a revision of the newer course is already under way.

Indeed it is true that one reason for the success of LaSalle's course lies in the constant enlargement of its scope, the repeated revision of its texts, and the bringing of "practice problems" thoroughly up to date. We believe it is also within the truth to state that no other educational institution has contributed so much to the upbuilding of the traffic profession as has LaSalle. That the traffic manager has advanced from a "job" to a "profession" may be credited, in large part, to the broad-gage training which approximately 15,000 traffic men have received from this single

The LaSalle ideal has been—at least so it has appeared to be to this one reviewer—that of maintaining the man's training just as much up to date as possible. The courses have been far more than a reprinting of tariffs, rules and statutes, such as anyone may obtain at slight cost. LaSalle, from the beginning, has used such material as a laboratory for training purposes. The course explains and illustrates them by adequate texts. One familiar with the constant changes wrought by I. C. C. decisions and new regulations by the

*"Traffic Management: LaSalle Extension University Course in Traffic Management." 69 vols. of text, 5,231 pp. Fow vols.: "Getting Ahead in Traffic," 277 pp.; "Atlas of Traffic Maps," 184 pp.; "Directory of Agency Tariffs," 239 pp.; "Railroad Tariff File" of 24 "practice" tariffs which are patterned after the three railroad freight Classifications and other selected railroad tariffs. "Miscellaneous Tariff File" consisting of "practice" tariffs of warehouse, motor freight, pipe line, express and steamship facilities. "The Traffic Law Library," comprising official volumes of: Regulations to Govern Construction and Filing of Tariffs, the Harter Act, the U. S. Shipping Act, the Merchants' Marine Act, U. S. Shipping Board Tariff Circular, their Rules of Practice, the I. C. C. Acts and Supplements, the I. C. C. Rules of Practice.

Published by LaSalle Extension University, Chicago, \$120. This price includes instruction by correspondence, counsel and confidential reports after completion of the formal course, and other aids. Single manuals may be purchased for \$1 each.

carriers can readily understand how great has been the task to maintain this rather unusual service. It must have been quite unlike preparing a course in English or bookkeeping, for which the rules of one generation hardly differ from those their grandfathers knew.

An indication of this determination is the recent revision of their texts (Nos. 55 to 58 inclusive) which now give a treatment of the new freight rate structures in the Southern Classification Territory as well as in the Southwest Territory. A complete new writing of these texts, with new sets of "practice problems," followed the recent I. C. C. decisions of Dockets 13,494 and 13,535 (Southern Class Rate Case and Consolidated Southwest Case). It is, in fact, this ideal of keeping the training practical and up to date that has given real value to the LaSalle course.

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The training is that of "the problem method." It prepares the traffic man to use intelligently the tools of his tradetariffs, maps, laws, rules and regulations, forms, Classifications, methods of packing, etc. The student is obliged to solve problems which years of work as a junior clerk might never bring to him. Routine traffic jobs are the same as routine jobs the world over-repetition of a small part of a bigger task. In this LaSalle training, however, the student is led to check rates, route shipments, prepare bills-of-lading, determine whether overcharge exists, if so to make out claims, file claims for loss and damage, analyze rates and rate structures, prepare charts and graphs, make up statistics to prove rate cases, etc.

After getting information from the texts the student is required to work out problems and submit them for criticism. For instance, in the twentieth assignment of this course, the student must check rates in the tariffs in order to determine whether overcharges exist on certain shipments. If he finds them, he must prepare and submit claim forms to correspond. To assist in this work, the course provides the student with all the usual forms of actual traffic workthe very tools he would use if working for a shipper. With the criticism of this work, which is done by the institution, suggestions for improvement are given and a set of model solutions provided to show in detail how the best handling would have attacked the same

LaSalle's course, for another matter, recognizes that many traffic managers are confronted with problems of traffic within the plant. Many others can add to the value of their jobs through accurate knowledge of transportation services and facilities, both of which may aid either the manufacturing or selling departments. Consequently, one manual of the texts treats of "Materials Handling and Plant Communication"; another of "Storage and Warehousing"; another of "Cartage, a Transportation Link"; and yet another of "Motor Truck-

One would expect that such a course would adequately cover the handling of tariffs, checking of rates, preparing claims, handling rate cases, etc. It does. Such training is the mental furniture of a traffic man.

The LaSalle instruction contemplates even more. Any student who has done the work properly should be able to qualify for "admission to practice before the Interstate Commerce Commission.' And, as well we know, the course has for hundreds of traffic managers provided "the legal and technical qualifications," required for that purpose.

The 69 texts, or "manuals," treat of

traffic subjects as follows:

TRAFFIC MANAGEMENT MANUALS

Section I

ORGANIZATION AND MANAGEMENT

INDUSTRIAL TRAFFIC FIELD:

- Organization of the Traffic Department.
 Operation of the Traffic Department.
 Management of the Traffic Department.

RAILROAD TRAFFIC ORGANIZA-TION AND MANAGEMENT:

Organization of the Traffic Department,
 Handling Traffic.

TRAFFIC GEOGRAPHY:

- Freight Sources and Carriers.
 Railroad Systems and Territories.

Section II

CLASSIFICATION, RATES, AND TARIFFS

RAILROAD FREIGHT CLASSIFICA-TION:

- 8. How Ratings Are Made.
 9. The Use of the Classification and Exceptions.
 10. Interpretation and Application of Rules 1 to 19, inclusive.
 11. Interpretation and Application of Rules 20 to 43, inclusive.

RAILROAD FREIGHT RATES AND TARIFFS:

- 12. Kinds of Rates.13. Kinds of Tariffs.14. Construction of Tariffs.

RAILROAD FREIGHT TARIFF GUIDE:

- Practice Tariffs No. 1, No. 2, and No. 3.
 Practice Tariffs No. 4, No. 5, and Supplements.
- piements.
 17. Practice Tariffs No. 6 and No. 7.
 18. Practice Tariffs No. 8, No. 9, and No. 10.
 19. The Tariff File.

RAILROAD OVERCHARGE CLAIMS:

- Causes, Prevention, and Preparation of Claims.
 Disposition of Claims.

Section III

TRANSPORTATION AGENCIES AND SERVICES

SHIPPING FREIGHT BY RAIL:

- 22. Preparing the Shipment.
 23. Forwarding the Shipment.
 24. The Shipment En Route.
 25. The Shipment at Destination.
 26. Demurrage and Storage.

MARKETING TRANSPORTATION SERVICES:

- 27. Rail Traffic Solicitation.
 28. Advertising, Development, and Public Relations, Water and Highway Traffic Solicitation.

INDUSTRIAL TRANSPORTATION FACILITIES:

- 29. Materials Handling and Plant Com-
- munication.
 30. Storage and Warehousing.
 31. Cartage.
 32. Motor Trucking.
 33. Rail, Water, and Pipe Line.

SHIPPING BY MAIL AND EXPRESS:

- 34. Domestic Parcel Post Service and
- Rates.
 35. Foreign and Domestic Mail Traffic.
 36. Domestic Express Service and Rates.
 37. Foreign and Domestic Express Traffic.

FOREIGN TRADE TRAFFIC MAN-AGEMENT:

- 38. Steamship Service and Rates.39. Export Shipments.40. Import Shipments.

Section IV

TRANSPORTATION LAW AND REGULATION

TRANSPORTATION LAW:

- 41. Regulation of Rail Carriers,
 42. Liability of Rail Carriers,
 43. Contracts of Rail Shipment,
 44. The Law of Water Carriage,
 45. Loss and Damage Claims,

INTERSTATE COMMERCE ACT:

- 46. Section 1. 47. Sections 2 to 13, Inclusive. 48. Sections 14 to 27, Inclusive.

GOVERNMENT REGULATORY BODIES:

- Interstate Commerce Commission Organization and Administration.
 State Railway Utility and Public Service
- vice Commission. 51. Canadian
- Transportation Law and Regulations.

Section V

RATE MAKING AND RATE CASES

RAILROAD FREIGHT RATE STRUC-TURES:

- 52. Principles of Rate Making. 53. Eastern Territory—Interterritorial Adjustments.
- justments.
 54. Eastern Territory—Intraterritorial Adjustments.
 55. Southern Territory—Adjustments from and to.
 56. Southern Territory—Adjustments with-
- 57. Western Territory—Western Trunk Line and Southwestern Adjustments.
 58. Western Territory—Pacific Coast and Transcontinental Adjustments.
 59. Import and Export Adjustments,
 60. Canadian Rates and Adjustments,

PREPARATION OF RATE CASES:

- 61. Procedure in Rate Making.
 62. Analysis of Transportation Statistics.
 63. Application of Transportation Statistics.
- e Presentation of Rate Exhibits 64. Graphic Presenta and Evidence.

GROUNDS OF PROOF AND PROCE-DURE BEFORE THE COMMIS-SION:

- 65. Under Section 1 of the Act—Factors in Unreasonableness.
 56. Under Section 1 of the Act—Compari-

- son of Rates. 67. Under Sections 2, 3, 4, 6, 13 and 15. 68. Handling the Case.

Accompanying the course of instruction is another series of four manuals, totalling 277 pages, which deal with "Getting Ahead in Traffic." These pamphlets discuss:

- The Planning Course.
 The Job-Development Course.
 The Placement Course,
 The Advance Course,

The repetition of the word "Course" on these pamphlets emphasizes their purpose. They are part of a personal training service, for which the purpose is to "enable you to become director of your own placement and progress; to this extent, the service is a self-placement one." It is designed for the traffic man who wants to improve his position and for the man who is determined to break into traffic work.

A careful reading of these four pam-

phlets is almost an inspiration to do one's best. They seem to merit the claim made by one industrial traffic manager for them:

"The pamphlets are unique, being the first treatise on the traffic employment problem. These books not only thoroughly cover the employment problem with reference to traffic but they rank with the best that has been written on the subject of placement and vocational guidance."

This reviewer would recommend that at least once a year any traffic man, however comfortably situated on his job, should take an evening to reread the pertinent portions of these 277 pages. He will do better work at his desk next morning. More than likely, too, he will improve either his job or win an increase in pay within one year. There is no reason why he should not repeat the performance annually.

As, however, one reads through these thousands of pages of texts, a few short-comings come to light.

Chief of these is the lack of an index. Fifty-two hundred pages of teaching text, distributed into 69 small volumes, without the semblance of an index is, frankly, disappointing.

This criticism should be taken with a remembering that the texts are, primarily, a course of training. Although useful as a reference work, the fact remains that it is a course of instruction. Each unit, or "manual," deals with a definite subject. For use of the texts as a whole, a complete outline is furnished the student so that he ought to be able to lay hand on any manual wanted. Each manual, furthermore, has a commendably complete table of contents.

The student, as he works through the course for the first time, may be expected to read it consecutively. He will hardly skip a page. Such a comprehensive lot of texts will not, however, be reread in their entirety after the initial perusal. Thereafter these 69 pamphlets, averaging 80 pages, will become "reference books" to the man who has paid \$120 for them as a tool of his training course. As "reference books" they become essentially "business" books, and, in the publication of business books, it is a cardinal principle that the business man is not expected to read a book through. He is, on the contrary, expected to draw from the book's information, as needed. The index, in this manner, becomes the kernel of the business book. Often it is the remark of publishers that "a business book is no better than its index.'

In traffic matters, for another matter, good indexing is the rule. The traffic man works with indexes every hour of his day. The railroad commissions, too, require adequate, and typographically perfect, indexes to all tariffs and classifications.

LaSalle, in the judgment of this reviewer, should set a better example to the traffic neophite—by a complete analytical index to these texts. If the task, or the cost, of a complete index is prohibitive, a series of supplements to the

index, such as obtains with tariffs themselves, might be used to maintain the integrity of an indexing method. Such a method would automatically adapt itself to the reissue, or revision, of any text; and would not interfere with the periodical growth of the course itself.

However the publishers determine to meet this need, that need is very greatat least so it seems to an outsider. For another consideration, the lack of an adequate index discourages the use of these texts after the student has completed the training. Were the texts more useful in the daily work of a traffic department, they might conceivably come to the attention of other employees who might possibly become "students" of LaSalle. In actual experience, graduates are compelled to purchase, and use for their daily problems, other publications, several of which do not even pretend to keep as closely up to date as do the LaSalle texts.

For, despite this course being primarily one of training, these manuals give the owner one of the few adequate discussions of the freight rate structure of the United States. They do the same for Canadian rates and the adjustment of rates for imports and exports. These complicated questions are handled in a manner that gives understanding. The information is kept up to date. Its completeness is most commendable. Often, too, LaSalle furnishes traffic managers the first analysis of a new rate structure interpretation of its meaning. Digests of far-reaching decisions are issued quickly, and, as soon as the new rate structure has become stabilized, and all reasonable supplemental orders and tariffs have been issued, a complete discussion is prepared for members. Matters such as these are beyond price in their value to traffic managers on the job. Yet the lack of an index diminishes the possible value of this service.

A reviewer wishes, furthermore, that one more manual might be added to these texts to describe the coordination of motor trucks and rail lines, somewhat in the manner of G. Lloyd Wilson's recent volume "Co-Ordinated Motor-Rail-Steamship Transportation," which was reviewed in the August issue of Distribution and Warehousing. Inasmuch, too, as Professor Wilson has already contributed several texts to the LaSalle service, there should be no difficulty in arranging for some such addition. the course now exists, a student might complete it with high credit and yet know nothing of "constructive stations," "store-door delivery," of the characteristic terminal services of Cincinnati, St. Louis, New York, or even the Chicago Tunnel-although, to be fair, the latter is discussed and a map printed in the "Atlas of Traffic Maps."

Other shortcomings that strike one's notice are the total lack of "training" for the container-car service of the railroads—a subject surely important to the traffic manager. Admittedly, to date, the container-car has a limited usefulness and the service is restricted to a small group of cities. Yet, without debate, the "well trained" traffic man

should know about the service, even if the only thing he does know relates t_0 its unsatisfactory results.

Nor is there any text to present the inland barge service, or traffic on the Great Lakes, or the canals. These subjects are briefly mentioned, it is true, in the volume devoted to solicitation of traffic (No. 28), under a chapter called "Water-Carrier Solicitation Arguments." But they are hardly more than mentioned. Nowhere, at least so far as this reviewer can determine, have these very important subjects been discussed. Here, again, a proper index would either give the information or show conclusively that it is not to be found.

In view of the rapid development of our inland commerce, and its immense importance to industrial traffic managers, this lack of treatment would appear to be serious. It is, for one consideration, a rather well known fact that traffic managers are selecting assistants from men who know the intricacies of barge and lake shipping-those intricacies having been acquired through the school of hard knocks, largely because no one has studied them enough to put the information into print. Herein lies a wonderful opportunity for La-Salle, not only to continue its ideals of an up-to-date lot of texts but also to give to the traffic world the underlying principles of handling freight over our inland waterways.

Motor trucking is made the title of No. 32, "Motor Trucking." Although this text is now about three years old it is surprisingly accurate even for today. Its principles still hold true and its outline for control of motor trucking is still good. A revision shortly would seem, however, to be in the line of LaSalle's policy, for the reason that motor trucking is stepping a fast pace. Within the past year, for example, motor truckmen are consolidating their routes, erecting "terminal warehouses" in cities large and small, and, for another matter, are developing "union terminal warehouses." Each of these phases is highly important to the traffic manager.

Motor trucking, like traffic over the inland waterways, is not so easily reduced into book form as matters relating to the railroads. The railroads are so closely supervised and regulated that every item of information comes quickly into print. All the information may be collected by a scholar who never leaves his study. With motor trucking and the inland waterways, on the contrary, the only effective way to assemble the data and the only way to learn up-to-date practices is to get them first hand.

The manager of traffic is largely in ignorance of all practices except the few with which he has had contact. He unquestionably would like to know what other managers are doing elsewhere, to know the pitfalls and advantages of possible arrangements, to know the principles developing in the field of this newer form of shipping freight. But the information is nowhere in print. Rightfully he should get all this from such a series of texts as the LaSalle publications.

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Law of Warehouse Construction Contracts and Mechanics' Liens

Thirty-second of a Series of Legal Articles

By Leo T. PARKER Attorney-at-Law

In many instances warehousemen have experienced difficulty in settling accounts with contractors who perform construction or repair work. Sometimes this difficulty arises from dissatisfaction with the quality of the work performed; or where the contractor abandons his contract; or where the contractor fails to perform the work according to plans and specifications.

Obviously, knowledge of the established law relating to the validity of mechanics' liens and building contracts will forewarn warehousemen against performance of acts which result in expensive litigation, as well as enable them to protect themselves against impositions by contractors employed to construct or repair warehouses.

First it is important to know that if, for any ordinary reason, a warehouseman fails to fulfill his part of a contract, the contractor is legally entitled to discontinue further work and to sue to recover the profit he may have earned had the warehouseman not breached the

For instance, in Hamilton v. Stephens, 215 N. W. 321, it was disclosed that a firm of contractors contracted to

perform certain construction work for \$4,656. The contract provided that the owner of the property should pay the contractor's weekly payroll, as the work progressed, as part payment on the contract price. The contractors had performed 50 per cent of the work when the owner refused to meet a weekly payroll and the contractors, not being satisfied, discontinued further work and sued the owner for breach of contract, claiming \$1,812 anticipated profits.

It is interesting to observe that the Court held the owner liable, stating the following important law:

"If the contractors were not carrying out their part of the contract, if they were not performing their work properly, then he [owner] had a right to terminate it and he would not be liable for any damages. On the other hand, if he did not have just ground for terminating the contract, he may still terminate it, but if he does terminate it under those conditions, then he is liable for any damages that result to the plaintiffs [contractors] as a result of his termination of the contract without cause."

CONVERSELY, it is well established that a contractor who breaches a contract is liable in damages to the warehouseman, and in many instances he is not entitled to payment for the work completed when the breach occurred.

For example, in *Mitchell v. Holomon*, 120 So. 672, a contractor entered into a contract with the owner of a lot, whereby the former agreed to construct a warehouse for a stipulated amount to be paid in installments.

The owner paid the first installment. Soon after the construction work had begun, and the frame of the building was partly completed, the contractor abandoned the work without good cause.

The owner sued the contractor to recover an amount equal to the payment made, plus damages which included the money he was compelled to pay for rent resulting from delay in completion of the building caused by the contractor's breach.

The contractor contended he was entitled to payment equal to the value of the labor and material he had expended in partly completing the frame of the building before he had breached the con-

tract. However, the Court held the owner entitled to recover damages from the contractor and refused to allow the contractor any payment for the partly completed work.

Defective Work

A NOTHER well established point of the law is that a contractor is liable in full damages if he installs defective work not in accordance with the plans and specifications.

If the defective work can be remedied, the contractor is liable for the cost of such repairs; but if the nature of the defects is such that the building cannot be altered to conform with the original plans and specifications, the contractor is liable in damages for an amount equal to the difference between the value of the building if it had been constructed according to the contract and its value when completed in a defective condition.

For illustration, in the recent case of Totten v. Houghton, 2 S. W. (2d) 530, the controversy involved the failure of a contractor properly to construct the foundation for a building according to the plans and specifications. The lower Court promptly held the owner entitled

to recover from the contractor \$625 expended for temporary supports, and additional damages amounting to \$4,500. The contractor appealed to the higher Court, contending that the lower Court had allowed excessive damages. However, the higher tribunal affirmed the lower Court's decision and explained the rules for determining justifiable damages, as follows:

"When the breach of a building contract is involved the rule is well established that, where the defects can be remedied without impairing the building as a whole, then the measure of damages is the reasonable cost of remedying the defects; and, where the defects cannot be remedied without impairing the building, then the measure of damages is the difference between the value of the building as constructed and as the building would have been constructed according to the plans and specifications. . . . However, this rule in no respects conflicts with the other important rule which allows an injured party, by reason of the breach of a contract, to recover such elements of damages for temporary repairs as are imposed upon him by the breach, provided such expenses were the natural consequences of the breach and reasonable under all the circumstances."

Mistake No Excuse

MOREOVER, the fact that a contractor unintentionally breaches a contract does not relieve him from liability.

For instance, in State v. Scholz, 4 S. W. (2d) 661, it was disclosed that a contractor entered into a written contract to erect, according to certain plans and specifications, an addition to a large building at a specified price. Later the contractor refused to complete the work when he discovered he had miscalculated the job and stood to lose several thousand dollars.

Nevertheless the Court held the contractor liable for failure to complete the contract, explaining the law on this subject as follows:

"A mistake in arithmetic made by a party bidding on a contract to erect a building, such mistake not having been induced by the other contracting party, but arising solely on account of the ignorance or negligence of the bidder, has never been recognized as an excuse for breach of a contract. Such fragile and unreasonable excuse can never be entertained to justify a breach of a contract."

However it is well settled that a warehouseman cannot recover damages unless suit is filed against the party who is responsible for fulfillment of the terms of the contract. Generally speaking, the principal contractor is personally responsible and the warehouseman may not recover from a sub-contractor who performs defective work or who breaches the contract.

In other words, a sub-contractor is not liable to a warehouseman although he may be liable to the principal contractor and the latter is liable to the warehouseman. So held the higher Court in Kircher v. Hunter, 281 Pac. 1047.

In this controversy an owner and a principal contractor entered into a building contract. The principal contractor as usual employed sub-contractors to install the different kinds of work. Certain of the work performed by a sub-contractor proved defective, and the owner notified the sub-contractor to repair the defects. The sub-contractor refused to do so, and the owner filed suit against him. The higher Court held the sub-contractor not liable, and said:

"The Courts cannot contract for parties, nor is there room for construction of this contract and specifications otherwise than as the parties plainly expressed their intentions."

Fraudulent Acts

STILL another important point of the law is that a contractor who fraudulently induces a warehouseman to enter into a building contract may be deprived of damages should the latter decide to breach the contract.

For example, in Jones v. Stevens, 271
Pac. 564, a contractor induced an owner
to enter into a building contract by
making a promise that he would assist
him to obtain a loan of money. Acting

on this promise, the owner signed the contract and the contractor proceeded to complete the plans and specifications. After the contractor had completed the drawings and specifications the owner notified the contractor that he would not complete the building, and the contractor sued to recover damages on the breached contract. However, the Court held the contractor not entitled to recover damages, in effect saying:

"It is perfectly clear from the evidence that the contractor at no time was able to provide the loan which he agreed to procure to finance the construction of the building. This loan, as is obvious, constituted the dominant feature or element of the consideration upon which the owner was induced to sign the contract for the erection of the proposed building."

Law of Payments

U SUALLY, payments should be made strictly in accordance with the contract; otherwise the warehouseman may be compelled to pay twice for the same

Next Month

THE law of forged and altered warehouse receipts will be discussed by Mr. Parker in his next article, to appear in the October issue.

Delivery to finder of receipts, transfers of title, sinilarity of receipts presented by different parties, employees' acts, the warehouseman's negligence, notification of transfer, loans on fictitious receipts — these and other phases of the subject will be covered, with Court rulings cited.

work. The leading case on this subject is *Hasson v. Bruzel*, 144 Atl. 319. Here it was shown that an owner of property and a contractor entered into a contract for alterations of and repairs to a building.

The contract provided that the work should be performed according to the specifications prepared by an architect and that the payments should be made when certificates for the same were issued by the architect.

The owner paid the principal contractor for certain work porformed by a sub-contractor, but he failed to have the architect issue a certificate for it. The principal contractor failed to pay the sub-contractor and the latter filed suit against the owner.

The question presented the Court was whether the sub-contractor was entitled to recover from the owner the amount paid to the principal contractor and for which no certificate was issued by the architect.

In holding the owner liable to pay this amount to the sub-contractor, although he had paid it to the principal contractor, the Court said:

"A reading of the contract in its entirety clearly indicates that the architect is to determine when the work is completed, if done in accordance with the contract plans and specifications and if and when money is due and payable therefor. To authorize the payment of the sum of \$650 the contractor was therefore bound to produce and present a certificate to the architect of such payment."

Mechanics' Liens

A LL State Legislatures have enacted laws which grant contractors mechanics' liens on buildings to secure payment for work and materials.

It is important to know that contractors are bound to strictly adhere to the State laws regulating perfection of mechanics' liens; otherwise the warehouseman may invalidate the lien.

For illustration, in Netting Co. v. Touscany, 225 N. W. 556, it was disclosed that a usual State statute provides that the principal contractor shall, whenever any payment of money becomes due from the owner, give to the latter a statement under oath of the number and names of every sub-contractor or laborer in his employ and the amount which is due.

The principal contractor failed to supply the owner with a sworn statement, in accordance with this law, and the latter contested the latter's legal right to a lien.

The contractor attempted to enforce the lien by proving that the only parties involved in the transaction were the owner and himself, and that he had paid all bills before filing the lien.

Notwithstanding this argument, the Court held the contractor *not* entitled to a lien, saying:

"No such sworn statement was made. Under the lien statute, the sworn statement is made an unvarying prerequisite to attachment of a lien by one claiming under contract with the owner. . . . The requirement is not dispensed with because the owner and the contractor are the only parties involved. . . . The requirement of the statue is not met by a showing that the work done and materials furnished were, in fact, paid for before the claim of lien was filed, or that the labor was performed by permanent employees of the contractor and materials were furnished from general stock and not secured specially from others."

When Lien Is Effective

U SUALLY, a contractor is entitled to a mechanics' lien and his priority rights date from the day he delivers the first materials on the ground or begins the work. Therefore a mortgage filed after the construction work is started is superseded by a mechanics' lien.

For instance, in Lawrence v. Wright, 124 So. 697, it was disclosed that before a building was completed, but after the first load of material was delivered on the grounds the owner of the property mortgaged it.

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In subsequent litigation the holder of the mortgage contended that, for the reason that the building contract was not recorded, his mortgage was prior to the lien. However, the Court held the lien prior to the mortgage.

Generally speaking, litigations involving priority of mortgages and mechanics' liens present unusual complications. However, the law is well established that a contractor's right to a lien dates from the time the work is started and, therefore, it is prior to a mortgage recorded after this time.

The holder of a mortgage is bound to prove that the mortgage was recorded before the contractor commenced his work, and if he cannot prove this, the fact that the mortgage forecloses the mortgage does not affect the rights of the contractor under his mechanics' lien rights.

Waiving

GENERALLY speaking, the sub-condractors are bound by a written agreement in which the principal contractor waives rights to a mechanics' lien, providing the contract is recorded in the county, or the sub-contractor is informed before making the contract that the principal contractor has waived all rights to liens.

For example in Clarage v. Corporation, 165 N. E. 550, a principal contractor entered into a contract with an owner to construct a building. The contract contained the following clause:

"The contractor hereby does effectually waive and release any and all liens for all the materials to be furnished and all labor to be performed under this contract..."

This contract was duly recorded in the county recorder's office.

Later the principal contractor sublet work to a sub-contractor who, after completing his job, was unable to collect payments from the former. The sub-contractor filed a mechanic's lien but, in view of the waiver in the principal contractor's contract, the Court held the sub-contractor not entitled to a lien, stating the following important law:

"The better rule seems to be that, where there is a direct and positive covenant in the principal contract against liens, it precludes all who work under, or furnish material to, the principal contractor. . . . We are of the opinion that the contract between the owner and the contractor clearly shows that it was the intention of the parties that there

should be no liens on the building, and that the contractor, for himself and for all others furnishing labor or material for the construction of the building to such contractor or any sub-contractor, effectually waived the right to any lien on the property, and that appellant [sub-contractor] is bound by that waiver."

Workmen's Pay

WHILE it is true that a person is not entitled to payment for work performed where he wilfully breaches a contract, yet if such breach is justifiable the former is entitled to recover full payment.

For illustration, in Arendsen v. Edw. D. Boyle & Co., 119 So. 282, it was disclosed that the owner of a motor truck and an owner of property entered into a verbal contract whereby the latter agreed to pay the motor truck owner a specified amount for each load of material hauled, without indicating when such payments were to be made.

After the owner of the truck had earned approximately \$200, and the company had paid him only \$50, the former demanded full payment, which was refused. He then abandoned the job and sued to recover the \$150 balance due for the work performed.

The company attempted to avoid payment by pleading the established rule that a person who abandons a job, or breaches a contract, is not entitled to a mechanics' lien or payment for the work performed before the act of abandonment. However, the Court held the owner of the truck entitled to recover full payment, saying:

"The contract was verbal and not at all specific. There was no stipulation as to quantity of material to be hauled nor as to payment for work done. I think it fair to consider that payments for the hauling must be paid as the work progresses. Plaintiff [owner of truck] was only paid \$50, less than one-fourth the amount earned under the contract, and he refused to proceed further with it unless he was paid weekly, or as the work progressed. Repeated demand for such payment was ignored by defendant. This refusal justified the plaintiff in abandoning the contract, and he is entitled to pay for such work."

Guarantees

A WAREHOUSEMAN is entitled to sue and compel fulfillment of guarantees given by the respective parties.

In other words, the warehouseman is not required to restrict his legal action against the principal contractor.

For instance, in *Tobias v. A. H. White* Co., 125 So. 179, the Court held a roofing sub-contractor personally liable to an owner for a ten-year guarantee on the roof. The sub-contractor attempted to avoid liability on the ground that he gave the guarantee to induce the owner to pay the principal contractor the amount due.

Also it is important to know that the guarantee was not addressed to any particular person, but read as follows:

"We hereby guaranteee composition roof on main roof . . . installed by us for a period of ten years, in which we agree to repair any leaks which may occur in our work, but which are due to rotting or wearing away of material, and for ten years which may be due to improper workmanship."

The sub-contractor further argued that, as the principal contractor had failed to pay him for the work, he should not be liable to the owner. Also, the counsel for the sub-contractor contended that the guarantee was invalid and unenforceable because it was not addressed to the owner. However, the higher Court held the roofing sub-contractor liable on the guarantees, saying:

"It is generally agreed that those for whose benefit the guarantee was intended may enforce it, and that a person who is only incidentally benefited by the guarantee has no right of action thereon. The difficulty arises over the determination of the fact as to whom it was intended to benefit by a particular guarantee. Where the guarantee is general in its terms, and addressed to no particular person, it is uniformly held that anyone acting on it may enforce it."

Generally speaking, a contractor is not liable for defective work which results from poor quality of materials specified by an architect or from defects caused by the owner. On the other hand, the Court implies a guarantee if the defects result from the contractor's negligence in applying the materials.

For example in *Emdon v. Olympia Co.*, 124 So. 615, the evidence proved that a contractor installed a defective roof and attempted to avoid liability on the contention that the leaks were caused because the sheathing sagged. However, as it was shown that the contractor knew that a previous roof installed on the sheathing had leaked, the Court held the owner entitled to recover damages.

S. J. Beer Leaves Warehousing to Engage in Newspaper and Publicity Work

SIDNEY J. BEER, for the past eight years manager of the publicity and new business department of the Los Angeles Warehouse Co., has resigned that position to engage in newspaper and publicity work with the Los Angeles Commercial News.

Mr. Beer has been a prolific and constructive writer of articles which have served to make business interests more intimately acquainted with the economies of the public warehouse method of distributions. His articles on warehousing, distribution, sales, production, consumption, etc., have been appearing in numerous publications, including the Los Angeles Commercial News and Lloyd's Gazette in London.

A. W. A. Paper

At the Los Angeles convention of the American Warehousemen's Association

in January of 1929 a paper on publicity and developing new accounts was presented on behalf of Mr. Beer, who in subsequent months has been putting A.W.A. business promotion texts before southern California's industrial public through his "Warehousing" column in the Los Angeles Commercial News. He has been conducting also the "Western Warehouse Merchandise" department in Western Truck Owner.

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Occupancy Reported on June 30 was Lowest Since February of 1929

Indicated Average of 68.3 Represents Also a Recession of 3.0 Per Cent Under Level of May 31—June Tonnage Was Lower, in Percentage of Volume Entering Storage, Than in May, but Was Above Marks in the Corresponding Month in 1928 and 1929.

By KENT B. STILES

PUBLIC MERCHANDISE WAREHOUSING May-June, 1930

					Tonnage					
Division and State		ber of houses	Floor	Cent of Space upied	Received During Month	Delivered on Arrival	Received During Month	Delivered on Arrival		
	*May 1930	June 1930	*May 1930	June 1930	*M	lav 930		ine 130		
NEW ENGLAND: Mass., Maine and Vt Conn. and Rhode Island	49	49	50.7	52.8	20,050	2,716	10,671	2,365		
	17	17	55.5	59.6	3,744	3,298	4,938	2,851		
MIDDLE ATLANTIC: N. Y. Met. District (1) Brooklyn Manhattan Nearby N. J. & all other New York New Jersey Pennsylvania	416	411	72.3	66.6	95,873	3,877	56,997	2,981		
	256	254	72.1	66.2	59,096	1,066	22,980	408		
	76	74	75.8	70.9	10,744	748	12,907	851		
	84	83	68.0	60.8	26,033	2,063	21,110	1,722		
	389	384	73.5	68.6	93,951	7,667	54,634	5,812		
	89	88	65.8	61.3	19,429	2,024	17,807	1,879		
	57	56	70.6	69.3	29,653	3,878	28,623	3,905		
E. NORTH CEN.: Ohio. Indiana Illinois Chicago Michigan Wisconsin	49	47	80.3	77.3	30,710	7,154	25,477	5,941		
	31	31	81.4	82.1	5,371	6,595	5,775	1,467		
	68	68	76.9	76.5	57,666	4,718	52,117	6,823		
	43	43	77.9	77.9	53,573	2,609	47,941	2,204		
	61	61	73.5	71.3	21,222	3,395	16,460	3,184		
	45	45	72.6	63.4	8,165	3,129	6,264	2,521		
W. NORTH CEN.: Minnesota. Minneapolis and St. Paul. Iowa. Missouri. St. Louis. N. Dak. and S. Dak. Nebraska. Kansas.	46	46	71.3	71.7	20,007	6,156	17,929	6,343		
	32	32	71.2	71.6	18,260	5,261	16,413	5,313		
	28	28	67.7	69.7	6.667	3,455	8,431	2,891		
	41	42	75.7	73.5	14,685	1,903	12,578	1,779		
	14	14	70.8	70.4	5,930	222	5,009	221		
	17	19	76.5	78.3	3,000	403	3,135	260		
	22	22	59.9	59.6	11,054	3,443	10,769	2,961		
	21	21	78.2	71.2	5,430	2,088	5,642	3,203		
SO. ATLANTIC: Del., Md. and Dist. of Col. Va. and W. Va. N. Car. and S. Car. Ga. and Florida	42	41	71.3	68.1	25,265	4,744	16,288	5,129		
	24	24	80.8	80.4	4,420	1,459	4,205	1,504		
	14	14	68.6	68.2	2,042	422	2,574	319		
	33	33	60.4	57.3	7,576	4,806	5,318	1,820		
E. SO. CEN.: Kentucky and Tennessee Alabama and Mississippi	17	16	62.5	56.4	6,603	2,190	4,714	1,909		
	15	15	69.9	74.4	2,065	1,234	2,625	1,120		
W. SOU. CEN.: Ark., La. and Okla Texas	41	45	72.8	74.1	28,094	7,532	34,938	5,369		
	45	45	58.5	58.7	14,738	6,448	14,907	6,401		
MOUNTAIN: Idaho, Wyo., Mont Ariz., Utah and N. Mex Colorado	19 26 22	19 26 22	75.9 67.9 71.2	72.8 69.1 70.3	1,569 3,651 1,364	1,317 1,446 2,396	948 3,844 1,092	1,174 1,140 1,809		
PACIFIC: Washington Oregon California	33 11 116	33 11 116	68.9 70.5 71.0	67.5 69.4 70.3	6,947 16,606 31,917	9,831 11,103 6,255	6,473 14,652 31,645	9,507 8,061 5,620		
Total for United States	1,488	1,484	70.3	68.3	503,661	123,205	425,473	105,067		

(1) Because of the importance of this territory, figures are shown separate from the State totals; this area includes all of the boroughs of New York and adjacent New Jersey territory.

F the space devoted to general storage in public warehouses, 68.3 per cent was occupied by merchandise at the end of June as reported to the Bureau of the Census of the Department of Commerce. This compares with 70.3 per cent on the last day of May.

In the accompanying table, made public at Washington on Aug. 19, the figures for May are final but those for June are subject to revision based on any additional reports.

The June 30 average occupancy percentage mark for the entire country 68.3-is the lowest recorded since February of 1929. In that month the same percentage was reported. Thence on there was a gradual advance, except for a recession in May-June-July period, until at the close of November a mark of 77.1 per cent had been attained. December brought a downward turn which was not interrupted until the close of May, when the percentage, 70.3, was sixtenths of 1 per cent higher than the level of April 30. That upward swing of the curve was only momentary, as June 30 brought a recession to the lowest level in seventeen months.

The provisional 68.3 for June 30, while below the mark reported on the same date last year, is a fraction more than 1 per cent higher than the percentage recorded on June 30 of 1928, as the following shows:

The tonnage figures in the accompanying table show that out of 530,540 tons arriving at 1,484 reporting warehouses during June, 425,473 tons, or 80.2 per cent, entered storage, the balance being delivered on arrival. This (subject to revision) compares with 80.3 per cent (revised and final) for May, when 503,661 tons went into storage out of 626,866 tons arriving at 1,488 reporting warehouses.

The following comparisons show that the June percentage of 80.2 is higher than was reported for the corresponding month last year and the year before:

29

June...... 74.8 75.7 80.2

The 80.3 per cent for May and the 80.2 per cent for June are the only marks which have exceeded 80.0 since January and February of 1928, the first two months of this statistical record-keeping by the Government.

Occupancy

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THE occupancy mark, for the entire country, this past June 30 was 1.7 per cent under the figure recorded for the same date last year but was 1.1 per cent higher than the level on that date

two years ago.

The 1.7 per cent decline this June 30 from the mark on last year's corresponding date was not reflected in the District of Columbia and sixteen of the States—Massachusetts, Vermont, Indiana, Iowa, Delaware, Maryland, Virginia, West Virginia, North Carolina, South Carolina, Alabama, Mississippi, Arkansas, Louisiana, Oklahoma and Texas, with Oregon unchanged. The largest gain was in Texas—20.7 per cent.

In the other States declines are shown. The broadest recession was 26.3, in Wis-

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Gains—this June over June of 1929, and June of 1929 over June of 1928—have been consistent in Massachusetts, Vermont, Indiana, Delaware, Maryland, District of Columbia, North Carolina, South Carolina, Virginia. West Virginia, Arkansas, Louisiana, Oklahoma and Texas.

The following comparisons are avail-

able:	Occupa	ancy—J	June 30
	1928	1929	1930
Mass. & Vt	49.7	52.6 65.9	52.8° 59.6
N. Y. Met. Dist. Brooklyn Manhattan Nearby N. J. N. Y. State Y. J. State Pennsylvania	77.7 78.4 79.3 77.0 77.5	78.3 80.9 70.8 78.5 76.6 78.5 70.1	66.6 66.2 70.9 60.8 68.6 61.3 69.3
Ohio Indiana Illinois Chicago Michigan Wisconsin	73.2 73.4 74.0 78.4	81.1 80.0 81.1 81.9 71.8 89.7	77.3 82.1 76.5 77.9 71.3 63.4
Minnesota Mpls. & St. P. Iowa Missouri St. Louis N. & S. Dakota Nebraska Kansas	70.1 67.5 73.4 69.5 80.0 57.7	73.2 72.9 67.4 78.8 79.9 93.8 67.6 79.2	71.7 71.6 69.7 73.5 70.4 78.3 59.6 71.2
Del., Md. & D. C. Va. & W. Va. N. & S. Carolina Ga. & Fla.	53.8 $ 60.0$	$ \begin{array}{r} 56.1 \\ 70.4 \\ 66.8 \\ 77.8 \end{array} $	$68.1 \\ 80.4 \\ 68.2 \\ 57.3$
Ky. & Tenn Ala. & Miss	$\begin{array}{ccc} \cdot & 62.4 \\ \cdot & 80.0 \end{array}$	$\begin{array}{c} 75.7 \\ 69.9 \end{array}$	$\begin{array}{c} 56.4 \\ 74.4 \end{array}$
Ark., La. & Okla Texas	58.5 36.6	$\frac{71.4}{38.0}$	$\frac{74.1}{58.7}$
Ida., Wyo. & Mont Ariz., Utah, N. Mex Colorado	67.0†	$72.9 \\ 74.5 \\ 74.4$	$72.8 \\ 69.1 \\ 70.3$
Washington	70.2	$70.7 \\ 69.4 \\ 77.5$	$\begin{array}{c} 67.5 \\ 69.4 \\ 70.3 \end{array}$
Average for entire U. S	5 67.2	71.0	68.3
Warehouses reporting.	1224	1230	1484
*Includes Mains			

^{*}Includes Maine. †Docs not include Arizona but includes Variation (Variation)

Every warehouseman receiving the monthly questionnaires from the Department of Commerce owes it to himself and his industry to send in replies promptly.

Comparing the June 30 occupancy percentages in the Department of Commerce table on the opposite page with those of May 31, it is disclosed that the recession, 2.0 per cent, for the entire country, was not reflected in Massachusetts, Vermont, Connecticut, Rhode Island, Indiana, Minnesota, Iowa, North Dakota, South Dakota, Alabama, Mississippi, Arkansas, Louisiana, Oklahoma, Texas, Arizona, Utah and New Mexico. In all those States there were advances, the maximum being 4.5 per cent in Alabama-Mississippi, closely followed by Connecticut-Rhode Island with 4.1 per cent. The greatest loss was 9.2 per cent, in Wisconsin. .

Tonnage

A S already pointed out, the percentage of volume which entered storage in June, out of the total arriving tonnage, was larger in the 1930 month than in June of 1929, the gain being 4.5 per cent. By divisions the comparisons are as follows:

Percentage Entering Storage—June 1928 1929 1930 72.0 84.1 88.6 73.2 53.7 79.7 74.6 59.8 74.9 89.7 84.2 77.0 76.4 70.7 80.3 78.0 81.8 86.8 72.8 59.3 80.6 84.7 57.0 64.7 Mountain $58.8 \\ 69.5$ 68.0 Entire country..... 74.8 75.7 80.2 Warehouses reporting.... 1124 1220. 1484

Comparing this past June's tonnage percentages with those recorded for May, it is found that a recession of 0.1 per cent was reported, for the entire country. This decline was reflected in five of the divisions, with New England evidencing the maximum drop, 4.9 per cent. The advances elsewhere were led by the West South Central group, with a 4.9 per cent gain. The comparisons by divisions for the two months follow:

| Percentage Entering | Storage | 1930 | May | June Change | New England | 79.8 | 74.9 | -4.9 | Middle Atlantic | 91.3 | 89.7 | -3.6 | East North Central | 83.1 | 84.2 | +1.1 | West North Central | 77.7 | 77.0 | -0.7 | South Atlantic | 77.5 | 76.4 | -1.1 | East South Central | 77.5 | 76.4 | -1.1 | East South Central | 75.4 | 80.3 | 4.9 | Mountain | 56.1 | 58.8 | +2.7 | Pacific | 67.1 | 69.5 | +2.4 | Entire country | 80.3 | 80.2 | -0.1 | Warehouses reporting | 1488 | 1484 |

Fireworks Blaze in Los Angeles Plant

A spectacular fire, believed to have been caused by spontaneous combustion, raged for eight hours on Aug. 4 in the Los Angeles Warehouse Co.'s plant at 318 North San Pedro Street. Thirteen firemen, affected by smoke, were removed to a hospital and others were partially overcome.

The blaze was thought to have started among fireworks, which were destroyed together with stocks of paints, sugar, rice and other commodities. Firecrackers exploded and rockets burst, endangering the firemen in their work.

Merle E. Turner, secretary of the company, was quoted in the local newspapers as saying that damage to building and contents totalled about \$200,000.

Poultry, Eggs, Cheese, Increased in Storage During the Past Year

DISTRIBUTION AND WAREHOUSING'S Washington Bureau, 1163 National Press Building.

THE drought had not reduced the amount of poultry, case eggs, frozen eggs and cheese in storage in the United States up to Aug. 1, it was indicated by the monthly report of the Bureau of Agricultural Economics of the U. S. Department of Agriculture. Stocks of all these commodities increased as compared with the amounts in storage a year ago.

Stocks of butter, however, decreased considerably under that on hand on Aug. 1, 1929. There were 145,297,000 pounds of butter in storage on this past Aug. 1, 1930, as against 151,621,000 pounds a

year ago.

There were 46,890,000 pounds of frozen poultry on hand this Aug. 1 as compared with 40,896,000 a year ago; 11,202,000 cases of eggs as compared with 8,962,000 last year; and 116,358,000 pounds of frozen eggs as against 91,488,000 a year ago.

The stock of American cheese on hand was 88,664,000 pounds as compared with 79,907,000 pounds a year ago; Swiss cheese, including block cheese, 6,330,000 pounds and 5,534,000 pounds; brick and munster cheese, 1,451,000 pounds and 1,205,000 pounds; limberger cheese 1,452,000 pounds and 1,172,000 pounds; all other varieties of cheese, 10,938,000 pounds and 10,252,000 pounds; meats, 810,974,000 pounds and 943,991,000 pounds.

-Stephens G. Rippey.

Autocar Van Book

The Autocar Company, Ardmore, Pa., has issued a 28-page booklet, called "The Autocar Van Book," which is designed in text and picture to outline the extent to which Autocars are used in the warehouse, moving, transfer and hauling and express businesses. Of more than a hundred illustrations, sixty are of trucks used by storage warehouses and the others are of vans operated in allied lines.

E. M. Bond Heads Safety Committee

E. M. Bond, president of the Bond-Chadwell Co., Nashville, has been named chairman of the safety department of the Nashville Chamber of Commerce.

TWO BITS

Vol. X. No. 6 A Bit Here, A Bit There

Gotham, September, 1930

O N a/c of the summer solstice, what with the heat up to 97 degrees outside our office window & the humidity 120 inside our personal cerebral space, Ye Ed. has been too physically & mentally helpless to mfgr any Two Bits page since last May, when No. 5 of Vol. X was published.

Nobody has kicked at the cessation & nobody has cancelled a subscription on

This indicates that storagers are just as well pleased without it, which was what we suspected anyhow.

I N our May issue we mentioned how Syd Green, the Southern W. A. exec. sec'y, had challenged any other assoc'n sec'y—except Neill Banister of the Texas assoc'n & Geo. Dintelmann of the Missouri assoc'n—to fight him for a \$5,000 purse.

We have not heard from Neill in this connection, but Geo. has written us to the effect that if Syd is scared to fight him (Geo.), perhaps Syd would be willing to debate with him (Geo.) on any 1 of the following:

"How Many Angels Can Be Balanced on the Top of a Cambric Needle?"
 "The Correct Interpretation of a

Formal Luncheon."

3. "What Shall a Young Bride Wear?"
4. "Topics for Fifty Sermons."

5. "What to Sing in the Bath Room." To us this looks like that Geo. is attempting to slur Syd's intellectuality. It is not entertainable that Geo. would propound questions which he could not himself answer, or suggest subjects which he could not himself debate fluently. It is inferred that Geo. infers that Syd (a) knows nothing about angels, (b) does not know what a cambric needle is, (c) has never attended a formal luncheon. (d) has never been a young bride, (e) wouldn't know a sermon if he heard same, (f) does not know how to sing, and (g) has only a vague idea, if any, as to what a bath room is for. In other words, if Geo. had thought that Syd knew anything on these subjects, he (Geo.) would have picked other subjects for Syd to debate with him (Geo.) on.

Well, the burden is now on Syd to prove whether he has the intellectuality to encompass, comprehend and discuss Geo.'s 4 self-picked subjects. As to whether he has, Ye Ed. will, while having our own opinion, remain neutral on a/c that Geo. wants us to referee the debate if latter is held.

We are not certain whether we want to be referee. Geo. figures that we have now been married long enough—(17 mos. this past Aug. 4, to be exact)—to qualify as a referee, but we will say that he definitely errs. Far from being a referee because of our 17 mos.' marital



experience, Geo., we need a referee in spite of that experience, Geo.

However, we will be glad to open our next *Two Bits* page, if any, to Syd's answers, if any, to Geo.'s questions.

OUR illustration this mo. is of as fine a group of gentlemen as ever assembled on any porch to have their joint photo snapped. The porch is that of the Grand Hotel at Mackinack Island, Mich., & the era of the assembly was 10 yrs ago—to be precise, in July of 1920, when the Nat'l Furniture Warehousemen's Assoc'n was organized.

In those days the great American indoor game yclept poker was highly popular at storagers' conventions. That was before poker had degenerated into the more costly sport called Red Dog. The group here photographed comprised the most intelligent poker experts at that 1st N.F.W.A. meeting, & if Geo. Dintelmann wants to debate on that subject we will take him on personally without Syd Green's help.

In order that you may know the iden-

tidy of those experts, we will tell you: Of the 5 standing, the 1st at your left is Ben Hurwitz, the Houston storager; Ben has not been coming to conventions lately but we hear he has learned how to play lotto. 2nd is Ellis Leritz, the Kansas City (Mo.) storager; Ellis has sort of dropped out of the 3d is Frank convention picture also. Fletcher; Frank was a Colorado Springs storager in those days but later quit storaging, & maybe poker-playing for all we know. 4th stood good old Jeff Perky, who was a Kansas City (Mo.) storager; as mellow a character as warehousing has ever known, Jeff has since passed into the Great Beyond where competition is clean and there is no rate cutting. 5th is "Doc" French, then with Moores & Dunford, Inc.; the last we heard of "Doc" he was sec'y of the Vermont Chamber of Commerce & was raising vegetables in the rural sections of that State.

Of the 4 seated, the 1st at your left is Bill Leet, of Chicago, who was, is, & may he ever be, Two Bits's western mgr. 2nd is Dan Bray, the Kansas City (Mo.) storager, whose middle initial, "P," stands both for Politics and Poker. 3d is Bill Ford, the Dallas storager; since those days Bill has been a prexy of the N.F.W.A., has twice become a grandpa, & has forsaken poker for bridge. 4th is none other than Ye Ed. of Two Bits.

Since this photo was taken, time has wrought changes also with Ye Ed. We have, during the intervening 10-yr period, (a) gotten married, which we do not regret; (b) learned how to drive an ottermobile, which does us no good on a/c that our wife refuses to ride in the same car with us; (c) abandoned roulette at the N.F.W.A. conventions at Mackinack, on a/c that our special system neglected to operate profitably; (d) essayed golfing, which we quit, couraged, after winning an N.F.W.A. convention tournament booby prize, which was 12 golfing balls which we still have & will sell cheap; & (e) have heard comments that our hair has turned gray, though, regardless of color, we still have more hair than some of the others pictured in the accompanying picture.

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Let's Take the Family Album Out of Storage!

Success Stories

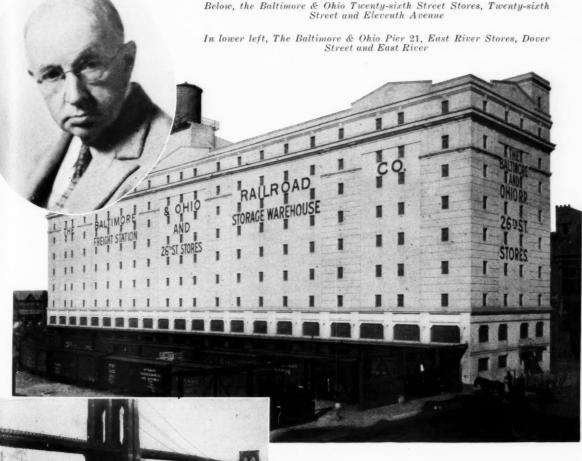
No. 96

Edwin Morton

By Elizabeth Forman

In oval, Edwin Morton, treasurer and manager of the Baltimore & Ohio Stores, Inc., New York

Below, the Baltimore & Ohio Twenty-sixth Street Stores, Twenty-sixth



S TATISTICIANS whose business it is to stretch things from end to end around the world and see how far they will reach, recently filled many pages with figures from which they computed that the central point for consumers' distribution for New York City is at Tenth Avenue and West Twenty-seventh Street. Walk two blocks from that corner and you will arrive at the office of Edwin Morton, treasurer, manager and operating executive of the Baltimore & Ohio Stores, Inc.

Mr. Morton has been engaged in the storage business for fifty years-a record which makes him, in point of service, one of the veterans, indeed, of the industry.

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Putting Inferred Action in the Warehouseman's Display Window

BY WILLIS PARKER

BECAUSE he has no merchandise to display, the warehouseman must depend largely on showcards, fancy, elaborate or otherwise, to construct window displays to attract the attention and arouse the interest of those who pass his place. Such materials are difficult to arrange and place so that there will be any semblance of life in the display.

Action must be inferred, but inferred action is often more potent than real action, according to Clarence A. Durham, Denver, an expert on electrical illumination and mechanics as applied to window displays.

That which seems to move holds the attention longer than that which is instantly recognizable as moving. For example:

Real or imaginary movement in the bushes along a roadside at night will get our immediate attention. However, if we know that there is a cow browsing nearby, we dismiss the matter quickly; if we are uncertain what caused it, we may slow down, or stop, and fasten our gaze on the spot for a few moments to discern the agent of movement or to satisfy ourselves that the movement was imaginary—inferred.

Inferred action in window displays may be obtained through the variations and changes in the illumination and its color as produced through the assistance of a dimmer or flasher control apparatus of which we offer, in the accompanying sketch, a design of a simple and inexpensive one which some member of the organization may construct and install. It includes the principles, but the warehouseman may construct it, or have it constructed, just as elaborately as he desires.

A description of how inferred action is obtained and what may be expected of it probably will simplify the description of the apparatus and how it is constructed.

BRIEFLY, the result is gained by changing color effects on showcards, on backgrounds and other objects included in the display. The changing colors produce an imaginary movement in the objects in the window. For example:

A blue light upon an object will give it one appearance, while a red light will alter it.

The problem is to change the illumination so gradually that the observer will feel that the motion is in the display itself and not in the illuminant.

Consider first the lighting system in the window. In modern business house windows there is a row of lamps along the front edge of the display window ceiling-known as the transom bar-and concealed by a valance. Ultra-modern windows have two banks of lights, but one will suffice for our purpose if there are enough lamps in the row. We shall divide the lamps into groups of four in order to have one white, one amber, one red and one blue in each group. should have at least two groups, or eight lights, though it would be better to have ten so that we might have one extra blue and one extra red, for there is less intensity to blue and red lights and therefore more candle power is required to produce an amount of legibility equal to that produced by amber and white.

We urge two of each color, however, so that the transition from one color to another may be accomplished more gradually and less perceptibly under the control of our dimmer apparatus. The more of each colored light in the window,

the more gradually the changes may be achieved.

Supposing that the warehouseman, in connection with his showcard messages and cut-out designs, desires to represent the dawn or a sunset:

The blue lights are on and depict the cold grey of the break of day. one of the red lights comes on, followed shortly by the other, which gives us the color of the sky a moment before, or as the sun lifts his face above the horizon. Next one of the amber lights comes on, followed soon by its mate, and we have the brilliant yellow light of the early morning. When the white lights come we have a good representation broad daylight. All colors are on, however, but the white and amber have sufficient strength to counteract the full effects of the red and blue. To get a sunset, the process is reversed-have all lights on, extinguish the white, then the amber, next the red, leaving only the blue as representative of twilight.

A thousand and one variations and effects may be produced.

As representative of what may be the effect of changing lights upon showcards and backgrounds, consider a white card with blue lettering under a blue light. The lettering is barely discernible. But when a red light comes on gradually, the lettering increases in prominence and legibility. Wouldn't that infer action? If the warehouseman will take a green card and letter his message in acrid orange, he will notice some startling effects when the illuminant is changed from blue to red and vice versa.

The accompanying sketch embodies the

principles of a more elaborate and expensive dimmer system. It is designed to control twelve lights, though the warehouseman may enlarge it or cut it down to fit his individual needs. We have purposely endeavored to hold the design simple and the construction inexpensive in order to make it practical for more of the trade to use it.

Briefly described, it consists of a series of round, wooden discs, 8 or 10 inches in diameter and an inch thick, each separated from the others by a fraction of an inch to insure insulation one from another, and all fastened to an iron rod (copper would be better) and all turning with the rod, which is actuated by a small electric motor. Around a portion of the rim of each disc is fastened a thin strip of copper plate, the length being determined by the maker as representative of the length of time he wants the light it controls to burn. Across the top is a row of brushes, which are thin strips of copper, which rest upon the discs as they revolve. Fastened to each brush is one wire leading to one of the lamps in the window. When the brush comes into contact with the copper covered section of the disc, the lamp is illuminated; when it touches the wooden section, the light is extinguished, as wood is a non-conductor.

In order to complete the electrical circuit through the apparatus, the rod, of axle, must be electrified by attaching a brush to the end of it, and there must be a copper wire leading from the copper section of each disc to the rod. We shall call the rod the negative side of the circuit and the row of brushes the positive side.

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tive side. The wire from the end of the rod connects it with the negative sides of all of the lamps in the window. The wire from each of the upper row of brushes runs to the positive side of one of the lamps. Hence when the positive brush comes in contact with the copper section on the disc, the circuit is completed and the light burns.

The copper strips on the discs are spaced unevenly and their lengths are varied to give different time periods to the illumination of the several lamps. The window decorator may make them longer or shorter, or space them this way and that, as he sees fit, or he may equip them with several short strips to give the flasher effect. All of this will be determined by experimentation after the appliance has been constructed and it is possible to construct it for less than \$50 for materials.

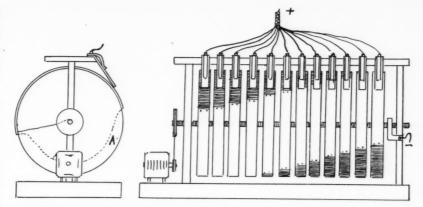
If the warehouseman has several windows, he may construct the apparatus large enough, by adding more wheels, to control the lights in all windows, or he may apportion a few discs to each

To gain the most from the plan, some thought must be given to color of the showcards and the backgrounds. Grey tones for backgrounds are extremely good, inasmuch as they serve to accentuate the movement in the light through their ability to assume and to reflect the color of the illuminant thrown upon them. Hence for the moment the color of the card may be blue, then red, then yellow and then grey. Greys, also, are pleasing for daylight exhibits.

In this connection we might mention what Mr. Durham has detected relative

to showcard colors.

As a rule, he says, the background against which any message is lettered should be of a color that induces thought. Cool colors, such as light blues, greys, etc., have the power of preparing the observer's mind for the message—sort of wiping out all other thoughts. The message itself should be lettered in



Sketch at left is representative of front view of suggested dimmer-flash apparatus. The row of brushes across the top contacts with the wheels, which are turned by a small electric motor. The white section of the wheels represents the copper-covered portions which, when they contact the brushes, cause the lamps to be illuminated. At the left is an end view of the machine. It will be noted that, on top of the brush, there is a spring which holds it securely against the wheel as it revolves. That section between the circumference and the dotted line and designated by "A" may be gouged out if the wheel is made of wood, to make absolutely certain that the circuit will be broken when that portion of the wheel reaches the brush. The lengths of the copper strips on the wheels will be computed by considering the speed with which the wheels turn and the length of time the lights are to be illuminated. Proper insulation is necessary at all times, particularly in the bearings where the rod passes through the upright sections

action colors, such as orange, red, brown, or even black.

In the use of illumination, colors in backgrounds, showcards and lettering, as well as in the selection of other decorative properties, purple should be used with caution. It is a maddening color, it is said, because the blue of which it is composed has the lowest vibrating wave of all colors, while the red in it has the highest. The constant conflict of these waves sets up a corresponding conflict in the sub-conscious mind of the observer and makes him nervous. Purple should be used like salt and pepper—merely as seasoning.

It is hoped that by the use of an

appliance containing the principles of that which we have described, and, by judicious use of colors in lights, in show-cards, in backgrounds and in the other objects in the display, the warehouseman may infer enough motion in his windows to cause the passerby to stop and ask himself "Did that thing move?" and then to pause long enough to watch the display to make sure that there actually was no motion in the window and that he was not laboring under an hallucination.

As Mr. Durham says, where a cycle of four different colors of lights is used, spectators are prone to remain before the window until the cycle is completed.

Winn & Russell to Have More Central Location on Jan. 1

WINN & RUSSELL, INC., a merchandise storage firm in Seattle, will on Jan. 1 occupy a warehouse in a new location—at 1014-1020 Fourth Avenue South—it is announced by J. W. Winn, president.

The Fourth Avenue (Pacific Highway) site is in the heart of the industrial and wholesale district and in the midst of the city's network of rail, water and motor terminals. It is flanked on one side by Matchett-Macklen and the National Grocery and on the other by the Western States Grocery, three of Seattle's most important wholesalers, while around the corner is the Schwabacher Grocery, another large wholesaler.

Freight stations of the four transcontinental railroads entering the city are within a stone's throw, and all of Hitch Your Warehouse to a Star

THE national distributor will look for the Star when consulting the 1931 Warehouse Directory in selecting points for storage. Will your listing be Starred next year? It will be if you notary the information you return.

the larger steamship lines have docks within a ten-minute walk.

The new building will be fireproof and equipped with a pressure sprinkler system and will be headed with automatic oil burner. Office space will be provided for patrons.

One feature will be an adjoining parking lot, 15,000 square feet in area, for trucks calling for merchandise and for cars of salesmen and customers.

The firm's present address is 1241 Railroad Avenue South.

Perky Firm Offers Employees Insurance

THE Perky Bros. Transfer & Storage Co., Inc., Kansas City, Mo., has offered its employees the advantages of a cooperative plan of health and non-occupational accident insurance. Under the cooperative features of the contract, which is being written by the Metropolitan Life Insurance Co., the Perky firm shares the cost with its employees.

Individual benefits, amounting to either \$15 or \$25 a week, are based on occupation. These weekly payments will be made when an employee is unable to work due to sickness from any cause, or injury received while off duty.

In addition to the actual protection provided, insured employees are offered the advantages of a visiting nurse service, while a health advisory bureau regularly distributes pamphlets on disease prevention and health conservation.

FROM THE LEGAL VIEWPOINT

By Leo T. Parker

Delivery of Goods to Depositor's Salesman

It is important to know that a warehouseman is liable for goods unaccounted for when he delivers goods to a depositor's salesman without proper authority. For instance, if a customer supplies a warehouseman with an accredited list of buyers to which he may ship the goods on the order of a salesman, he may be liable if he ships merchandise to customers not on the accredited list, although the salesman authorized.

thorizes the shipment.

For example, in Peter Schuttler Co. v. Herrin Transfer & Warehouse Co., 126 So. 505, it was disclosed that a warehouseman and a depositor entered into a written contract by which the former agreed to receive at its warehouse platform; to store the goods; and deliver them to any freight depot at the stipulated prices named in the contract. The agreement further provided that the warehouseman was to render a daily statement of all goods shipped; to keep a record of the stock on hand; and to render a monthly statement of all charges against the depositor.

The warehouseman was furnished by the customer with an accredited list of customers to whom the former was authorized to make shipments. The names of some of these accredited customers were withdrawn and others added from time to time during the life of the con-

tract.

Controversy developed when the depositor contended that the warehouseman failed to account for \$2,140 worth of the goods. The warehouseman stated that he had shipped these goods on orders given by the depositor's traveling salesman who was authorized to solicit orders for goods to be filled from the stock stored with the warehouseman.

However, as these orders were shipped to persons whose names had been removed from the depositor's list of accredited customers, the Court held the warehouseman liable for \$2,140, saying:

"The plaintiff [depositor] did approve and did acquiesce in the delivery of some goods on the order of the agent to parties who were not on the list of accredited customers. But in every instance report was immediately made to plaintiff with a check in payment of the order. . . . None of defendant's [warehouseman's] officers, employees, or bookkeeper, were able to present any record whatever to show what goods had been delivered to Rentz [salesman]. The

defendant simply let Rentz take charge of plaintiff's [depositor's] goods and to handle and dispose of them as his own."

Collection of Charges

FREQUENTLY legal controversy results where the owner of goods and a warehouseman enter into a sales agreement and subsequently the owner decides to retain title to the goods and store them. It is important to know that unless the parties consider the transaction one of storage, the warehouseman is not entitled to recover storage charges.

For example, in Stites v. Montana & Dakota Grain Co., 284 Pac. 536, it was

Your Legal Problems

MR. PARKER answers legal questions on warehousing, transfer and automotive affairs.

There is no charge for this service.

Write us your problems. Publication of inquiries and replies gives worth-while information to you and to your fellows in business.

shown that a wheat grower mortgaged his crop to the Union Central Life Insurance Co. under agreement that the latter should receive one-third of the crop. The grower sold his whole crop of wheat to a warehouseman. The insurance company demanded payment of its one-third and the grower paid back to the warehouseman one-third of the money received for the crop and wrote a letter to the warehouseman, as follows:

"I am herewith leaving one-third of my entire crop raised on the place that the Union Central Life Insurance Company holds a mortgage on. . . . You are hereby instructed to hold this amount of wheat subject to the Court to determine whom this wheat rightfully belongs to."

The warehouseman issued a storage receipt payable to the order of the grower and the Union Central Life Insurance Co. for one-third of the crop, but did not deliver it to either the grower or the insurance company. No action

was ever commenced to determine the ownership of the wheat, and the insurance company released its claim against the wheat and the proceeds thereof.

The warehouseman refused to deliver the wheat to the grower until the latter paid the storage charges. During the subsequent litigation the warehouseman tendered into Court the storage ticket and offered to deliver it and the wheat to the grower upon payment of the usual storage charges.

It is interesting to observe that the higher Court held the warehouseman bound to deliver the wheat to the grower without payment of the storage charges.

saying:

"While the statement signed by plaintiff [grower] contained a recital that he was leaving with defendant [warehouseman] one-third of his crop with instructions to hold the wheat subject to determination of ownership by the Court, it is shown that what he actually returned to and left with defendant [warehouseman] was the proceeds from one-third of the crop. . . . Had plaintiff delivered wheat to the defendant [warehouseman] for storage, defendant was obligated, not only to issue, but to deliver to plaintiff, a warehouse receipt. This it did not do

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. . . Had the parties treated the transaction as one for the storage of wheat, the storage receipt should have been delivered by defendant [warehouseman] to either plaintiff or the Union Central Linsurance Company, and the storage charges would then have been properly collectible upon the return of the receipt

properly endorsed."

Liability of Corporation

A DE FACTO officer is one who has the reputation and position of the officer he assumes to be, and yet is not entitled to the office in point of law. Also, a de jure officer may be one who has the lawful right to the office but who has either been ousted from it or has never actually taken possession of it. In general, the contracts of all offcers de facto, acting within the sphere of their office, are binding upon the corporation. In other words, although a de facto officer is not a legal officer and he may be ousted by legal procedure, yet the corporation is liable for all contracts he makes while acting in his usual capacity.

For illustration, in Consumers v. Rig-

gins, 282 Pac. 954, it was shown that a man named Mullholand was elected secretary of a corporation by the directors who were not legally qualified to elect a secretary. Controversy developed over the validity of contracts made by the secretary. The Court held the corporation liable for contracts made by Mullholand, stating important law as follows:

"Even if we assume that their election as directors was illegal, and therefore they were not de jure directors, they were, nevertheless, under the facts just stated, de facto directors of said corporation, and as such their acts were binding upon the corporation in all respects as if they were the de jure directors thereof. Where a person not eligible to the office is declared elected, and no stockholder objects or takes legal proceedings to test the right to the office, and such person is allowed to perform the duties of his office, he becomes an officer. As such his acts cannot be objected to on the ground that he was not a legally elected director. Neither corporate creditors, nor the corporation, nor the stockholders, nor the director him-self, are allowed to raise this objection in that manner."

Receipts of a Bankrupt

T is well settled law that all firms and persons who are bona fide holders of securities and other property received from a firm which later becomes involved in bankruptcy proceedings, are entitled to hold such securities and property free from legal claims of the bankrupt's common creditors. Otherwise the trustee in bankruptcy may obtain possession of the property and distribute it equally among the bankrupt's creditors.

For instance, in Gerber & Co. v. First Nat. Bank, 148 Atl. 669, it was disclosed that a seller shipped a large quantity of cheese to the National Grain Co., which stored the merchandise in a warehouse and deposited the warehouse receipt with a bank as security for a loan. This same day the president of the bank was appointed receiver of the National Grain Co., which was adjudged a bank-

Controversy developed when the creditors of the grain company demanded the warehouse receipt for the common benefit of all of the creditors.

The counsel for the bank contended that the latter was a bona fide purchaser of the receipt and that it had the right to retain it free from claims of the creditors. However, as the president of the bank was informed, when the warehouse receipt was accepted, that the grain company was adjudged a bankrupt, the higher Court held the bank not entitled to retain the receipt. This Court

"The right of the bank to retain the proceeds of the sale of the cheese, as against the trustee, depends upon whether it received the warehouse receipt in good faith, without knowledge of any breach of duty by the party negotiating it, and gave value therefor. The bank became the holder thereof on November

23rd, the day following that on which the petition in bankruptcy had been filed . . . its president had long been a director of the grain company [purchaser] and on the very day of this transaction accepted appointment and qualified as temporary receiver in bankruptcy of the corporation. We think the inference follows, inescapably, that the bank is to be charged with knowledge of the bankruptcy proceeding when it received the warehouse receipt as security for the note. . . . In consequence the bank was not a bona fide purchaser or holder in due course of the warehouse receipt and obtained no right to retain the same, as against the estate of the bankrupt for the benefit of all its creditors.'

Liability for Injury

I NASMUCH as warehouse employees are compelled in many instances to leave equipment on the highway during the night, it is important to know that care should be exercised to place it so that persons and travelers reasonably careful for their own safety will not be injured.

In West Texas Co. v. Haynes, 20 S. W. (2d) 236, it was disclosed that a driver left equipment on the road. During the night a farmer riding in an automobile and leading two horses came along the One of the horses became frightened at the equipment and ran away, effecting serious injuries. Court held the owner of the truck liable, stating the following important law:

"Where a horse of ordinary gentleness becomes frightened at objects reasonably and naturally calculated to frighten horses, which one has negligently placed and permitted to remain on the highway, and an injury results without contributory negligence, the one who so negligently has permitted such objects to remain on the highway will be liable for the damages occasioned by such injury, unless the party injured is guilty

of contributory negligence."

Truck Law Held Void

ENERALLY speaking, any law is G invalid which has irregularities, inconsistencies or contradictory terms.

For example, in Scenic-Better Roads Highway Dist. v. Hay, 283 Pac. 41, a State law was passed which was titled "An Act to provide restrictions as to weight and size of motor vehicles as used upon the highways of this State and providing for special permit, and declaring an emergency."

Later the law was amended to read:

"The commissioners of counties, highway districts . . . are hereby authorized, when in their judgment any traffic over roads or highways is of such a nature as may be deemed abnormal, or of a nature which will cause undue damage to the roads and highways, to require payment . . . sufficient to provide for the cost of extra maintenance made necessary by such traffic, if permitted to operate over the roads and highways."

The commissioners sued a motor truck owner to recover payment for use of the highways. However, it is interesting to observe that the Court held the law invalid, and said:

"The vesting of authority in the commissioners of highway districts to require payment for using the highways is neither embraced in the titles of the Act nor properly connected therewith: the subject-matter has no relation to restrictions as to the weight and size of vehicles used on the highways.'

Railroad Subject to P. U. C. Control

NASMUCH as, in many localities railway companies, and other transportation companies, have employed the owners of motor trucks to haul freight, the recent case of New York Cent. R. Co. v. Public Utilities Commission, 170 N. E. 574, presents unusually interesting legal information.

In this case suit was filed against the New York Central Railway Company to compel it to cease its operations of hauling freight by means of motor trucks. Proof was submitted that the railway company made a contract with a company known as the A. B. Peek Company, under which the Peek company agreed to transport from station to station between Cleveland and Toledo all such freight as the New York Central might deliver to such company. The evidence further showed that, following the execution of the contract, and in operation thereunder, the New York Central delivered freight to the Peek company at various of its stations between Cleveland and Toledo, which the Peek company thereupon transported in trucks on public highways between such stations. The trucks and trailers used for this operation are owned by the Peek company. The freight thus carried was transported under bills of lading and regular freight waybills such as are used by the railroad in all other freight operations.

Under the contract for such transportation the Peek company received a fixed compensation, for such haulage, at the rate of 15 cents per hundredweight, with a guarantee of \$30 per day—i. e., \$25 per truck and \$5 per trailer-for the five regular trucks and four trailers used between Cleveland and Toledo, with provision for a flat rate of \$5 per day for each additional trailer and \$15 per day for each additional truck used.

The contract further provided that the Peek company should be responsible for all loss or damage to freight in its charge or while being handled by it, and should assume all liability for the payment of damages on account of injuries or death to its employees or to others, or damages to property by reasons of the performance of the services required by the agreement, with the further provision that the agreement should be terminable by either party on 30 days' written notice; the railroad company, however, to have the right to terminate the agreement at any time if the service performed should in its judgment be deemed unsatisfactory.

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The agreement further provided that the Peek company should have no right to assign the contract and that it should not use its trucks or any of them in performing any trucking service for any other person or corporation.

The evidence showed that 74.4 per cent of the number of shipments was interstate.

The counsel for the railway company contended that the State Commission had no legal right to compel it to secure a certificate because it did not own or operate the trucks and, also, that its business was interstate.

In view of these facts the higher Court granted an order requiring the railway company to cease the hauling, saying:

"The only issue of fact was whether the New York Central Railroad Company owned, controlled, operated, or managed the trucks used in the transportation of such freight . . By the use of these trucks the New York Central Railroad Company cannot and has not divested the carriage of the features of a common carrier transaction. It still holds itself out to the public as a common carrier of this freight, which it transports upon motor vehicles. It receives this freight in exactly the same way at its freight stations that all other freight transported by its railroad is received. As between the public and the New York Central Railroad Company the transaction is exactly the same as that of transportation by rail. Hence the New York Central Railroad Company under this record is not only a common carrier for hire, but with reference to this particular freight it is a common carrier for hire, and the contract of carriage never ceases to be a contract of common carriage."

In another leading case, Interstate Corp. v. Holyoke Ry. Co., 273 U. S. 45, the Massachusetts law required a license and a certificate of public convenience for operation of motor vehicles on public highways for intrastate carriage for hire. The Supreme Court of the United States held that the law was not shown in that particular case to work a direct interference with or burden upon the interstate business of the transportation company, which carries both interstate and intrastate. The Court decided that the State has power reasonably to regulate and control the use of its public highways in the public interest.

On the other hand, it is interesting to observe the distinction made by the Court in the leading case of *Motor Freight v. Public Utilities*, 120 Ohio, 1. In this case it was disclosed that truck owners were employed to haul for a common carrier named Motor Freight Co.

In this case the testimony established that the Motor Freight Co. did not own, control, operate, or manage any motor propelled vehicles. Moreover, the carrier did not hold itself out as willing to serve the public indiscriminately. The truck owners furnished their own drivers, and the drivers were not in any way subject to the orders of the Motor Freight Co. No particular route was designated. The transportation was purely interstate. No intrastate question was involved. All of the truck owners in the Motor Freight Co. were free to haul merchandise for others.

In view of these facts it was held that the Motor Freight Co. was not subject to the control of the Public Utilities Commission.

Disobedience of Employee

It is well established law that a ware-houseman is not liable in damages for an injury effected by an employee who disobeys instructions and thereby acts outside the scope of the employment.

However, if the act causing the injury is within the scope of the employment, the warehouseman is liable although the injury is inflicted while the employee is disobeying his employer's instructions,

So held the higher Court in the recent case of *Federal Warehouse Co. v. Jones*, 21 S. W. (2d) 857.

In this case a warehouse employee injured a pedestrian when he disobeyed his employer's instructions and dropped a bale of sacks out of the warehouse window onto the sidewalk.

In holding the warehouseman liable in damages for the sum of \$1,500, the Court said:

"The rule is firmly established that the master is civilly liable for the tortious acts of his servant whether of omission or commission, and whether negligent, fraudulent, or deceitful, when done in the line of his employment, even though the master did not authorize, or know of such acts, or may have disapproved of or forbidden them . . . As we understand the law applicable to cases of this character, although an agent may exceed his authority to the extent even of violating instructions, if, at the time, he is er gaged in the business he was employed to perform by his regular employer, his employer would be responsible for injuries resulting from his torts."

R. W. Dietrich Points Out Some Important Louisiana Law Affecting Warehousemen

ALLUDING to Mr. Parker's opinion, on page 32 of the July issue of Distribution and Warehousing, to the effect that goods stored by third parties in leased warehouses in Louisiana can only be held for the amount of indebtedness to the warehouseman owed by the owner of the stored goods, R. W. Dietrich, president of Dietrich & Wiltz, Inc., New Orleans, comments on Louisiana law as follows:

"Mr. Parker refers to the decision of the Supreme Court of Louisiana in the case of *Powers v. Florance*, 7 La. An. 524.

"In another decision the Supreme Court of Louisiana, in the case of Vairin & Co. v. Hunt, 18, La. Rep. 498, stated as follows:

"Goods or effects of sub-lessees or persons storing property in a warehouse under lease, are subject to the proprietor's right of pledge or privilege only for such sum as they may be owing at the time this right is enforced."

"In this case, on page 501, the Court, concluding its opinion, said:

"'In a city like ours [New Orleans], through which vast quantities of produce and goods are continually passing either to be sold for exportation or to be carried into the interior of the country, it would be detrimental to the interests of trade; if a different rule was to prevail, provisional seizures for large arrears of rent would be constantly obstructing the free and extensive transaction of business, and would, in some cases, lead to extreme hardship and injustice; it is from considerations of this kind, we understand, that elsewhere goods stored in warehouses, in the course of trade, have been considered as placed there temporarily and have been entirely exempted from distress for rent.'

"Furthermore, Article 2706, referring to the landlord's privilege or right of pledge, reads in part as follows:

"'This right of pledge includes not only the effects of the principal lessee or tenant, but those of the under tenant, so far as the latter is indebted to the principal lessee, at the time when the proprietor chooses to exercise his right.'

"In the case of Powers v. Florance referred to by Mr. Parker, a painting was stored on the leased premises and was seized by the owner of the premises for unpaid rent, and the decision reads in part as follows:

"'A landlord cannot, in an action against his tenant, seize the property of the third persons, on which no storage is due, although it may be found on the leased premises.'

"In this case, the Court gave damages for illegal seizure of the painting in question, which belonged to a third party and which had been stored.

"Again, in the case of Wallace v. Smith, 8 La. An. 374, the Supreme Court held that:

"The landlord has a lien on goods on storage to the amount of storage due."

"Our legal counsel, Mr. Theodore Roehl, concludes from these cases as follows:

"'I would therefore advise you that it is my opinion that goods on storage may be seized by a landlord for past-due rent of his lessee only to the extent of any unpaid storage which might be due by a third person who has stored his goods in the premises in question. In case of a provisional seizure of such goods, the owner of same may protect himself by tendering to the landlord the amount of the unpaid storage which is due.'"

New Orleans Business and Realty Groups Behind Stagger Lease Movement

A PROGRAM has been launched in New Orleans which encourages the local moving men to believe they will finally be relieved of the annual painful "moving day." Many efforts have been made in the past to spread their activities over the full year instead of crowding the bulk of their work into a single month, with a high peak on Oct. 1. The present plan is believed to be far more comprehensive than any other that has been attempted in the Crescent City.

The local moving trade has succeeded in getting the New Orleans Real Estate Board behind it, as well as the weight of the New Orleans Association of Com-

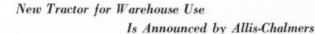
At the first meeting of these groups, in the first week of August, the stagger lease system was approved. A finance committee was named and work was started at once on a comprehensive program of education through which it is hoped that property owners will be made to see the advisability of authorizing their real estate agents to effect the stagger lease system.

The plan to be followed in New Orleans follows closely that of the Chicago Homes Economic Council. It is hoped to make every month a leasing month. At present the majority of leases in New Orleans expire on Oct. 1. This means that for several weeks prior and for about two weeks after Oct. 1, with the high peak on the first day of that month, the streets are filled with vans.

This rush season, long regarded as a nuisance by both moving men and the public, is looked upon as an economic loss to everyone concerned, including the property owner. The group just organized hopes to make the property owner realize his loss, and thereby to eliminate "moving day."



-New Orleans Times-Picayune

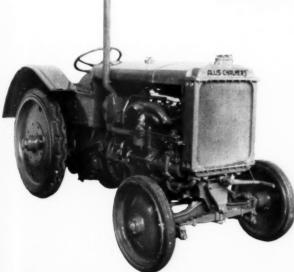


A NEW narrow tread tractor has been announced by the Allis-Chalmers Manufacturing Co., Milwaukee, for use around warehouses, docks, freight yards, or wherever a tractor must work in close quarters. It has an outside width of only 47 inches.

The narrow tread tractor is an adaptation of the Allis-Chalmers Model U (United) industrial tractor. Front and rear wheels were brought in closer to the tractor by shortening the axles. Certain other changes in design were also made to keep the job narrow throughout. Spring mounted front axles are furnished when desired.

Rear wheels are of standard diameter, but those in front have been made smaller. Small front wheels permit short, quick turning, which is an advantage for close-range work. Front tires are $24x3\frac{1}{2}$ and rear tires 40x5.

A 4-speed transmission is standard equipment, providing four speeds forward and one reverse. In fourth gear the tractor travels up to 20 miles an hour.



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New Business for Warehouses

No. 58

Handling Exhibits at Trade Conventions

RADE conventions have ceased to be helter-skelter gatherings run, each year, by a green crew of officers who were elected one year ago and who will be succeeded this year by a yet greener lot. Trade organizations are now too important to their industries for slip-shod methods to prevail.

Men are now trained in specialized schools to become "secretaries" or "executive secretaries" of associations. They have their own annual conventions for interchange of experience; they are an important department of the annual meeting of the Chamber of Commerce of the United States; they ride the trains all the year to hold their membership in line and to represent the trade before Legislatures, lobbies, railroad commissions, the Treasury Department and various trades. And, as these men have become professional in their work, so the conventions they control have come to be business undertakings with definite purposes in view.

At these trade conventions the "exhibition hall" is no longer any old basement or adjoining building that can be cut up into booths 15 by 20 feet and rented to some manufacturer for \$25. Not at all. These professional secretaries have been schooled to know the value of display; they have moved the exhibition hall into a place more prominent than the banquet room and usually so located

that it is impossible to enter the meetings without passing through aisles of display; they have done all this so effectively that any manufacturer who sells to that particular trade values the convention display quite as highly as his page advertisement in the industry's publications. Not all the trade will see the exhibit, of course, because not so many come to the convention as read the periodicals, but, for those who do come, the opportunity is given the manufacturer to demonstrate as is not possible in the printed advertisement.

Conventions, furthermore, are supplemented by annual "shows" of which each city now has at least one. In fact nearly every city of progressive spirit has now erected its convention hall or auditorium or colisseum or civic building, the design of which makes ample provision for shows of this sort. Thus we have automobile shows and food shows each winter. We have a succession of shows for flowers, electrical devices, household equipment, builders' supplies, sporting goods, air craft, road makers' equipment, radios, bakers' supplies, live stock, dogs, horses, kindergarten work, printing and illustrating, advertising arts, garden tools and seeds, "ton litter hogs," county farm products, drugs and surgical supplies—the list is almost endless.

ASK any man who has had charge of a booth for a week and the answer will be some variation of:

"An awful headache!"

Manufacturers dread exhibits. The Sunday preceding is a terrible hustle and bustle, probably with work all Sunday night. The convention doors swing open at ten Monday morning with the irritated exhibitor scurrying to finish some last thing. Then at the end of the week, following six wearisome days on their feet, these same men must spend another Sunday frantically fighting with truckmen and packers to get out of the place.

The headaches are probably inevitable. They come because an exhibitor faces so many things not seen by the crowd that surges past the booth. Those troublesome things are, however, coming to be known to the executive secretaries and trained managers of conventions, and these men each year are doing more and more to remove the irritations and vexations plunged upon their exhibitors.

Cities of today have convention boards, or similar organizations, whose sole duty it is to invite trade conventions to come to the city for their annual meetings. Trade associations, in their turn, are growing wise. They no longer rush to a city without investigating its ability to entertain the members—"entertain," in this case, not meaning joy rides and free meals half so much as abundant hotel rooms and adequate halls for exhibition purposes. Then, as a next step in the negotiations, these trained executive secretaries demand definite information as to the manner of handling the exhibits in and out.

The veteran executive manager of a large association said to me, when discussing this subject in July:

"If the exhibition hall looks like the left-over of a street carnival, I know there's been rotten management. If the local committee knows how to run a convention, the hall will be clean and ready for the next convention in less than twenty-four hours after we adjourn. The glad-hand secretary isn't worth a hoot unless he's got brains enough to plan the exhibition so that everybody won't be stumbling over everybody else and swearing like mad."

Opportunity

YET no convention board, except in such a place as Atlantic City, where they make a business of conventions, can afford to keep a staff of men for this purpose. The management must find someone in the city who is equipped to bring in a large force of trained men, reliable and honest, for two days of rush work before the meeting and a day or two after its close.

Nowhere is this opportunity better found than with the furniture warehousemen. And, in city after city where the problem has been licked, any eye can see the trucks and tags of one of this profession. The chance for new business lies open to warehousemen in any city where the proper relation has not already been cemented with the conversion board.

For, the furniture warehouseman has a crew of men trained to handle goods with care—men who know the difference between a fragile showcase of radio tubes and a block of sandstone; men who can set down a bowl of lemonade without slopping it over the floor. The warehouseman has trucks a-plenty without

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hiring a lot of roustabouts from the streets; the warehouseman knows how to get goods from the freight house after 5 p. m. and from the express office Sunday night. The warehouseman, too, knows where to lay hand on a 2 by 6 timber; without running half way across town to a lumber yard he can supply an Oriental rug or a grandfather clock or a piano to complete the scheme of decorating the booth. His packing crew can quickly set up a dummy fireplace, connect up the water for a laundry machine, repair the leg of a radio cabinet, solder or weld a split joint, polish and shine and lacquer anything on earth!

Odd jobs such as these are day-to-day affairs with the furniture warehouseman. He is, of all the business concerns of a city, one of the very best equipped for setting up a convention. As nearly as anyone, his staff includes men who are versatile for Jack-of-all-trades emergencies-and if the exhibition hall of a convention on Sunday morning is not a mess of emergencies, I, for one, never saw trouble! No one but a furniture warehouseman-skilled in handling irate and disheveled housewives-can work calmly amid two or three hundred cursing men, most of whom are unfamiliar with the telephone system of the city, know nothing of streets or railroad terminals, and many of whom are by no means mechanically minded.

A warehouseman can assure the convention management that Monday morning will not reveal three or four booths glaring like empty eye sockets, just because someone failed to "connect." And, it is well to remember, a refund of dollars does not reimburse the manufacturer whose booth is "gaping with emptiness." He has lost, for one year to come, the advertising value of displaying his goods to a given number of selected prospects.

Cutting Costs

I N addition to their headaches, exhibitors complain over the excessive expense of their booths. This item of irritation also is disappearing under the experience of trained convention managers.

Each exhibitor has, in the past, been obliged to make his own contract for decoration of the booth; sometimes even for erection of its framework. He has had to arrange his own delivery of lumber and other materials, his floor covering and chairs and accessories, his goods for display, his printed matter for distribution, etc. Cartages have been multiplied to a needless extent. Worse still, there has been a lack of helpers at the hall, so that each exhibitor has been obliged to bring in workmen for each job. These men completed their task in ten minutes or half an hour, but, when the timeslips showed up, a charge appeared for three hours, or four hours, of time-because, like the plumber of the funnyman, the man's time began when he was summoned to the job and ended when he had returned to his shop.

Costs, in this manner, have been excessive. Each exhibitor has had to act for himself, making individual arrangements for work which could be done co-

operatively if only someone had planned the cooperation.

Today, among trained convention managers, one warehouseman, or a group of them, takes over the whole job. Costs are thus cut very materially, and, after all is over, the headaches are fewer—or, if they exist, must be laid to other convention "activities."

Salvage .

THE warehousemen, too, can further cut costs by salvaging the materials at the end of the week. He can use for crating the odd lengths and small quantities of lumber which have gone into the booth and its furnishings. What he can afford to offer may not be much; but, to the exhibitor, it is something to offset the cost of the booth.

The warehouseman carefully saves the in-coming crates, with all special packing and inside fittings, holding them in readiness for the end of the week. With his usual method of tagging each piece he handles, too, the warehouseman runs no risk of mixing goods as they are repacked—these mix-ups being one of the griefs of every convention manager.

Exhibitors find it necessary to have their men at the convention hall two days before the opening and to hold them over for at least one day after the close. Inasmuch as these men are on expense account, every time one of them becomes irritated and squanders a needless long distance call or rushes away somewhere in a taxicab or summons a truckman for a double delivery, the additional cost of the manufacturer's exhibit rises. Were this to happen only once a year, little would be thought of it; but, with exhibits on the road nearly all the time, the total becomes a real item of the year's business. It is the subject of many complaints.

If, therefore, the warehouseman is able to assure the manufacturer that his display will be in place as shown on the blue print, nothing lacking and nothing damaged, the manufacturer can see an immediate saving of three days' time and expense for his men. In all probability the total charged by the warehouseman will be less than the sum of all the petty items of his own man.

In talking with convention managers we find that the warehouses have had enough experience now so that some of them quote flat rates to exhibitors for the entire job-receiving in-coming matter, unpacking, preparing the booth, setting up everything as outlined on a blue print, removing after the convention, repacking and reshipping. Often, too. storage for a brief period follows the convention, the goods being held until another convention somewhere else requires shipment out of store. Manufacturers like the flat rate, however high it may look when first quoted. It has the inestimable advantage of covering those "extras" which are the bugbear of business.

Taking Orders

I T is a growing custom of exhibitors to take orders at their booths. Few of them have solved the problem of imme-

diate shipment; for, they find by sad experience, the purchaser usually buys on the impulse of seeing the display, and, if receipt of the goods be long delayed, the shipment is sometimes returned. Desire for the article has lessened with the lapse of time.

Manufacturers of small articles, therefore, such as surgical supplies and garden tools, try to have on hand at the booth a reasonable stock. Delivery is made at once.

Interviews with exhibitors, especially during the summer of 1930, indicates that many of them would welcome a suggestion to handle these orders through a local warehouse.

The opportunity is ripe for warehouses to ship out, each day, those orders which the booth is able to sign up, so that when the purchaser returns home he will be welcomed by what he has bought. These exhibitors tell me that their days behind the booth are so hectic, and at night they are so weary of the whole convention business, that they allow orders to accumulate until the end of the week. Then a few more days elapse before they are filled by the factory; and thus two weeks, even more, will pass before the purchaser receives his goods.

Much the same thing happens with literature for which the booth asks attendants of the convention to sign coupons or request cards. These cards pile up in the box, and, in the judgment of some exhibitors, are so delayed one way and another before the literature is mailed out that much of the favorable impression is lost.

It is conceivable that the warehouseman could do this mailing, day to day, just as he would ship orders for account of the manufacturer.

The warehouse could thus become a storage place for surplus literature, for a stock of the goods, and for the crates and packing cases of what does go into the booth.

Nor should the warehousemen think that repeat business is lacking. A convention of any trade is not expected to meet in one city two years in succession, it is true, but it is equally true that an exhibitor may have a booth in your convention hall as many as a dozen times in a year.

General Electric or DuPont make such a wide variety of products that they have a booth at nearly every convention of all the hundreds of big associations; Borden and Frigidaire may be found at all sorts of industrial shows; Baker's Cocoa and Crisco and Pillsbury are represented at scores of conventions every week of the year.

So it goes—the convention, never again; but the exhibitor, possibly next week!

Suggestions

O UT of a wealth of suggestions from interviews with warehousemen who have developed convention business have come some proven ideas of how to work. For, remember, many warehousemen are already enjoying this business.

The warehouseman should work

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through his local committee. In all probability this will be a more or less permanent committee of the chamber of commerce or convention bureau. It may even be a paid full-time secretary for convention work.

Working with this party, the ware-houseman should see that the bureau cooperates in putting the warehouseman before intending exhibitors. The warehouseman, in turn, can greatly aid in selling convention booths to distant manufacturers, by coupling the offer of his services with the offer of the booth. A flat quotation, or the offer to make such a quotation, gives the manufacturer a chance to estimate his total cost to exhibit.

Nothing, apparently, helps so much in this solicitation as facsimile letters from those exhibitors who have previously patronized that warehouseman. Testimonials, coming from one manufacturer to another, seem to turn the trick more than anything else.

The warehousemen tell me, furthermore, that they use colored shipping In this they pattern after the colored baggage tags given by conducted tours to each passenger—the bright color identifies the valise and prevents anyone else picking it up. So, colored labels warn railroad employees and truckmen to keep hands off. The labels are addressed to the warehouse, with correct routing, each having a symbol or number to identify the manufacturer for whose booth the goods are intended. Labels of a different shape or another color may be used for surplus literature or stock of goods to be retained in the warehouse.

Some warehousemen, in their solicitation, mention their ability to supply accessories. Among these may be mentioned rugs, chairs and stools, tables, desks, writing materials and desk blotters, racks for printed matter, small tables for booklets, pianos and radios for background, grandfather clocks or pictures for the same purpose, bunting or burlap for wall coverings, even hat and coat racks. If the exhibitor requires hot water or a cooking process for demonstration, the warehouseman names a price to install the stove and provide gas for a week.

Until you have had experience "putting on exhibits" at conventions as a manufacturer who knows no one in the town, you have no idea of the hundreds of unseen difficulties. No single one of these is great, but, in the rush of getting everything done in two days (one of them a Sunday) the petty items of cost seem never to end.

A manufacturer welcomes, for this reason, the offer of some reliable local concern which will take upon itself all these annoying details for a quoted price.

Another most successful plan is to let the manufacturer know, in advance, that the warehouseman will have an office of his own on the exhibition floor; and—emphasize this point—that an attendant will be on hand both day and night for, say, two days before the convention opens; then every hour that the doors are open and a reasonable time before and after hours; and, finally, for two days after its close.

Give the distant manufacturer the telephone number of this emergency office; invite him to call you for any trouble; invite him, also, to use your telephone for emergency calls to his own representatives.

"And." recommends one warehouseman whom all in the association know for his progressiveness, "tell them not to hide themselves under that old bushel basket.

"I do it this way.

"I have cards printed for each convention, telling them about our office on the floor. I tell them their home office has been advised to use us for long-distance connections. I ask each man to register his correct name with us and his location on the floor. I let them have local packages sent in our care; I promise to attend to sending out packages for them; I do all I can to make them think of our little warehouse office as a place to get service.

"Then, after the convention's over. do you think it's any trouble to get an O.K. on my bill, even if it has some extras?

Well, I should say not."

He might have added, which he did not, that these men are boosters for his warehouse. They are also highly in favor of letting some warehouseman prepare their booths in other cities and remove the goods at the end of the week.

Mailing List

ANY city which has a convention bureau will issue, from time to time, schedules of coming conventions. By reasonable cooperation with the proper employee it is possible to obtain these lists even in advance of public notice.

From the officers of the trade association it is then usually possible to learn the names of exhibitors or prospective ones. If this fails, or if the names are not yet known even to the association, a working list for solicitation may be found in the list of exhibitors at last year's convention. At any rate, that list will give rather definite ideas as to the sort of manufacturers who will want booths.

From the Department of Commerce has been issued a book of about 200 pages called "Commercial and Industrial Organizations of the United States" which lists between nine and ten thou-These are sand trade associations. grouped into national associations, State organizations and local ones. Governmental, educational, civic, agricultural. professional and religious organizations are not given in this publication, its field being limited to trade and business. For each association there is printed the correct name, the address of the principal office, the number of members, the date of the annual meeting, and some other information.

This publication is reissued from time to time, approximately once a year. It is invaluable to anyone who wishes to correspond with a trade association. The book is available for sixty cents by application to the Superintendent of Documents, Government Printing Office, Washington, D. C.

To supplement this volume the warehouseman should apply for a copy of "Convention Dates of Trade Associations" which is published twice a year by the Chamber of Commerce of the United States, Washington. The issues come out in March and October. Application will bring a copy without cost. This publication gives the dates and places of conventions of trade associations with addresses of principal officers. It indicates also which conventions "hold exhibits in connection with the meeting"-an item quite valuable for our present purpose. The associations are arranged in alphabetical order, but, later in the booklet, under another arrangement, is given "convention dates by months, including places of meeting."

Massachusetts Congresswoman Announces a Campaign to Eliminate Moths

REPRESENTATIVE EDITH NOURSE ROGERS, Republican, of Lowell, Mass., announced at Washington recently that she would institute a campaign in Lowell for the eradication of moths. She hoped, she said, that some method would be worked out by which housewives may rid their homes of the pest and that the idea would spread throughout the nation.

Untold damage to furniture in the home had been done by the presence of moths and the lack of knowledge among housewives as to how to rid their homes permanently of this menace, Mrs. Rogers declared, adding that she would ask Government agencies to conduct experiments to aid in determining the best methods of accomplishing her objective.

Dr. E. A. Back, United States Department of Agriculture entomologist in charge of stored product insect investigations, commenting on Mrs. Rogers's announcement, said her proposal would be beneficial if it resulted in any spread of knowledge among housewives as to methods of controlling moths.

The Department, stated Dr. Back, who has frequently discussed the subject at conventions of the National Furniture

Warehousemen's Association, did not know of any solution which would permanently and absolutely mothproof any fabric; however, it would seem that certain solutions, if properly used, were capable of imparting a moth resistance of practical value.

Control of moths in homes, according to Dr. Back, is a continuous process, as the moths live and breed in a wide variety of places, such as cracks between boards, piles of feathers, the hair of pet animals, and many other outdoor and indoor locations, and if they are elimi-

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The "TwinVeyor": A New Elevating and Tiering Machine

NEW portable, flexible, power-driven A elevating and tiering conveyor, called the Clark TwinVeyor, has been placed on the market by the Clark Trucktractor Co., Battle Creek, Mich.

It uses a new principle, according to the manufacturers. Two external spiral tubes are turned toward each other by a power head. Anything placed on the conveyor travels forward rapidly, perfectly balanced.

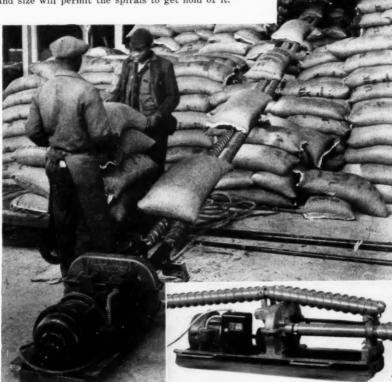
A standard unit comprises six 8-foot dual sections and a power head. Each section is light, joins to the assembly with an automatic lock, and is easily shifted about by one man, and the entire 50-foot line can be assembled or disassembled in six minutes. Flexibility is secured by the ability of any joint to take a 15-degree angle horizontally or may be tilted 15 degrees up to 10 degrees down. In the elevating operation, sections may be supported by the material which has already been stacked.

A hurdle section permits any number of the 50-foot units to be hooked together, forming a continuous line of any desired length. The traveling load hurdles each power head in the line. Right and left spiral chutes are provided for shunting the load from one TwinVeyor line to another without manual handling, thus making right angle turns simple.

An extension cord attached to the power head may be plugged into any power line. The flow of power along the entire TwinVeyor is smooth and constant.

Two complete 50-foot TwinVeyors, disassembled in fifteen minutes, can be loaded onto one factory trailer. A power head section weighs 365 pounds, each 8inch dual section 140 pounds, and an entire 50-foot assembly 1205 pounds.

The TwinVeyor is for handling raw materials, finished products in bags, crates and boxes; and experiments are being made in handling the finished products itself, without packaging, where its shape and size will permit the spirals to get hold of it.



The Wedgelock: A Device to Protect Goods Against Damage in Transit



DEVICE to enable shippers to protect merchandise against damage in transit and to save on lumber and labor and packing time is announced by the Wyrick Engineering Co., Wyandotte, Mich. It is called the "WYRomat-ICK" wedgelock, and is illustrated herewith.

The wedgelock is made up of two wedge-shaped blocks, which slide on their inclined faces. A tension spring in a slot between these faces urges the blocks to increase their joint tension, thus holding them in contact. When the two blocks are urged against the action of the spring, the joint dimension, or distance between the upper and lower surfaces of the wedgelock assembly is brought to a minimum. As space permits the locks to move, the spring slides one block on the other and the distance between the upper and lower surfaces, or joint dimension of the assembly, is increased.

When the wedgelock is used for packing purposes (between an article of merchandise and the side of its container) the ends of the wedgelock are forced together by hand, the wedgelock inserted into the space, and the pressure on the wedgelock released. The wedgelock then automatically extends far enough to make a snug fit between the two objects-reducing the clearance to

Once in position, it is claimed, no jolting, vibration or direct force (short of that necessary to crush the material of which the wedgelock is made) will cause it to reduce its vertical or variable dimension. Consequently it cannot work loose or drop out of its original position, nor can it exert undue pressure between the objects it separates.

Because it effectively prevents shifting and bumping, the manufacturers declare, its use will permit a reduction in the strength, weight and cost of containers-something of importance to shippers.

In order that a shipper may accurately determine the size of wedgelock best suited to his individual needs, assorted kits have been prepared, each including a range of sizes and a sufficient number of wedgelocks to enable the packers to familiarize themselves with the device, its use and its capacities.

A new household goods storage firm, the K. & E. Storage Warehouse, has opened for business in a four-story fireproof warehouse at 105-107 Franklin Street in the Heights Section of Jersey City.

WITH THE ASSOCIATIONS

HERE is presented in tabloid form the Association news that is of general interest to the industry as a whole. No effort is made to publish complete reports of all Association meetings; the dissemination of such information is logically the work of the officers and the committee chairmen. What is presented here is in effect a cross-section review of the major activities so that Association members may be kept advised as to what "the other fellow" elsewhere in the country is thinking and doing. When annual or semi-annual meetings are held, more extended reports will occasionally be published.

McHugh Is Elected Head of National Truckmen's Body

A DOPTION of a new constitution and by-laws to strengthen the purpose of the National Team & Motor Truck Owners' Association to "promote the general welfare and interests of the team and truck owners of the United States was perhaps the most important action taken by the organization at its twenty-eighth annual convention, held at the Hotel Statler in St. Louis on July 21 and 22.

The acceptance of new rules for the association's guidance was the result of efforts by D. J. McHugh, Cincinnati, acting president since the death, last October, of George J. Oberhotzer, of Philadelphia. Mr. McHugh, who pleaded strongly for a revival of interest in the association, the need for which was apparent, was elected president.

One change was a McHugh idea for upbuilding through a provision that the secretary be appointed by the president, instead of being elected as in the past. Furthermore the secretary is to be retained on a salaried basis.

Harry B. Rubey, executive secretary of both the Cincinnati Team & Motor Truck Owners' Association and the Furniture & Piano Movers' Association of Cincinnati, was appointed as the first secretary under the new constitution and by-laws. Announcement of this selection by Mr. McHugh aroused enthusiasm, being regarded generally as auguring well for the national organization's future.

Under the new constitution the management of the association is now vested in a board of directors, which will consist of eighteen members, not more than one member being from any one city, and an executive committee comprising the president, the treasurer and the first vice-president.

Two classes of membership are provided for, active and associate; the latter consists of those "whose interests harmonize with the interests of the Association." The initiation fee is \$25, and dues are \$10 a year.

Following an address by Phil H. Brockman, president of the Federal Truck Co. of Missouri, in which he pointed out the importance of a legislative committee to direct favorable legislation and to oppose that which might be unfavorable as to taxation and regulation, the constitution was amended to provide for the appointment of such a committee by the president.

It was decided to hold the next convention in Atlantic City, N. J., at a time to be selected by the directors. The convention accepted this as a recommendation of the committee on resolutions, which urged also that the conventions be held at places where there were no local memberships and that the delegates themselves pay the expenses of the program, including entertainment. The Philadelphia local was expressly asked to follow out this resolution.

It was the opinion of the members that the members of the local associations should not be taxed for the entertainment of the convention. While the resolution committee thanked the St. Louis members of the association for providing the program and the members felt grateful therefor, it was the sense of the convention that it was too much of a burden, and that the members should pay their own way.

It was stated by a member of the St. Louis committee that \$3,000 had been raised by the solicitation of advertisements in a program of the convention, and that the local itself therefore had to pay nothing. Some members declared that the solicitation of such advertisements required time, and others doubted the soundness of such solicitation.

To Issue Bulletin

The ways and means committee recommended that the association issue a monthly bulletin. This will be in charge of Mr. Rubey.

Besides Mr. McHugh, officers were elected as follows:

First vice-president, James M. Naye, Philadelphia, who had been secretary.

Second vice-president, John Broderick, Chicago.

Treasurer, W. J. McDevitt, Cincinnati, re-elected.

Directors, Charles Nelson, Detroit; Robert Clark, Cincinnati; William Broderick, Chicago; Roy S. Stubbs, Kansas City, Mo.; Frank Salvatore, Pittsburgh; L. H. Corrigan, Cleveland; H. D. Franks, Wooster, Ohio, and Frank Britton, St. Louis.

The convention was opened by P. A. Wiltz, president of the Association of Team & Motor Truck Owners of St. Louis, and the address of welcome was delivered by Associate City Counselor Woods, who referred to the severe competition being given the railroad by the motor trucks. Replying to this, Mr. Mc-Hugh said the railroads need not worry about the trucks, as they were two separate institutions, one supplementing the

other, and that there was no competi-

Mr. Naye reported as secretary that the association had 173 members in good standing. The attendance at St. Louis was approximately 100.

After routine reports and the appointment of committees, the remainder of the morning was devoted to a discussion and adoption of the new constitution and by-laws

The first speaker on the second day was Charles U. Becker, Secretary of State of Missouri, who, discussing "Reciprocity Between States," told of the efforts to have motor truck licenses honored by all the States. Some difficulty had been experienced, he said, with Arkansas, which provides that trucks must have Arkansas licenses if they enter the State loaded, and with a few other States.

Col. Phil H. Brockman, who is a former President of the Board of Police Commissioners, spoke on "Organization and Co-operation," stressing the value of group action. The motor truck, he said, was the most necessary thing in our economic life.

"There is not a thing which we eat, wear or enjoy that is not transported by motor truck some part of the way," he declared. "Visualize, if you can, no motor trucks in operation for twenty-four hours. This would stagnate business of the world, and cause an economic loss of untold millions.

"If there ever was a need for your organization, it is now, largely because of so much legislation being talked of and enacted, much of it of a harmful nature. The officials of the various taxing divisions of our country are ever increasing taxation on motor trucks to a point where it is imperative that State and city officials be educated and furnished with facts and figures that they may know about the motor truck and its efficiency and its prime necessity in business and social life."

Col. Brockman pointed out that while trucks comprise about 12 per cent of the total number of registered motor vehicles on the road, truck owners are paying some 28 per cent of the total automotive taxes.

"We in the motor truck business," he asserted, "must be willing to pay our just proportion of taxes, but we do not want to pay any more and we do not want the funds from automobile taxation diverted to other channels, such as schools, State institutions, etc. If we pay more taxes than is necessary for the

building and maintenance of streets and highways, then we should ask for a decrease in taxation.

"There is so much of legislation against motor trucks in the making, such as compulsory insurance, individual State motor truck license, size and weight restrictions, regulation of common carriers and buses, increased taxes, etc., that there is need for a real legislative committee."

Col. Brockman urged that members take a real interest in their local safety councils.

C. P. Owens, maintenance engineer, State Highway Department of Missouri, discussing "Road Usage by Motor Trucks," declared that restrictions as to weight and size of truck loads were mandatory, as it was not economically possible to design pavements and bridges of such width and strength as to carry any load which might be made at some future date. "If these restrictions can be made reasonable but uniform, then no hardship is worked on either the truck owner or the average highway user and taxpayer," he said.

"Team and truck owners should be the first to insist on uniform and reasonable restriction laws and uniform enforcement. If we would only remember more often the Golden Rule, we would have less need for more laws. Truck owners, being in the minority, occupy a precarious position. The average passenger car operator resents the use of the highways by large buses and trucks, although he may profit directly or indirectly through their operation. This resentment is partly due to the belief, and sometimes true belief, that the large vehicle is tearing up his road, partly due to road-hoggish acts by truck drivers and partly due to that very human inborn desire, present from childhood to dotage, to 'gang' the big fellows.'

Mr. Owens dwelt at length on the necessity for proper lights, brakes and other equipment.

Capt. Robert E. Lee, secretary of the St. Louis Automobile Dealers Association, was one of the busiest men at the convention, introducing all the speakers and presiding as toastmaster at the association banquet.

The delegates were the guests of the Lapeer Trailer Co. at luncheon at the Missouri Athletic Association on the first day of the convention. This was followed by an automobile tour of the city, a dinner at Van Horn's Farm, and a performance of "Maytime" at the St. Louis Municipal Theater in Forest Park, all as guests of the St. Louis local association. There also was special entertainment for the ladies.

-Roy M. Edmonds.

Rhame Makes Hole in One

George A. Rhame, Minneapolis, secretary of the Minnesota Warehousemen's Association and business manager of The Merchandise Warehouseman of the merchandise division of the American Warehousemen's Association, recently

When you ship goods to a fellow warehouseman—use the annual Warehouse Directory.

made a hole in one after thirty-seven years of golf. He sank his tee short on the 105-yard eighth hole at the Pine Beach Golf Club at Gull Lake on July 22.

The foursome in which Mr. Rhame was playing at the time included C. D. Coggeshall, president of the Federal Storage & Van Co., Tulsa, Okla., who has a summer home at Pine Beach.

Mr. Rhame is a member of the Minneapolis Golf Club.

Headquarters Offices of Trade Associations Mostly in Three Cities

HEADQUARTERS for 60 per cent of all national, international and interstate trade and commercial associations in the United States are located in three cities, New York, Chicago and Washington, D. C., according to a trade association list maintained by the Department of Commerce, it was stated orally July 24 on behalf of the Domestic Commerce Division.

It was explained that these three cities have always been favorable headquarters for various associations engaged in fostering trade activities. Although New York has more than twice as many trade and commercial associations as Chicago and Washington together, the latter two cities have increased in importance considerably during recent years as headquarters for such organizations, it was said.

According to an analysis of the list of associations included in the biannual publication of the division, 679 of the 2000, or 34 per cent, are located in New York City; 323, or 16 per cent, in Chicago, and 190, or 10 per cent, in Washington, D. C. The remainder of the associations are distributed throughout the various sections of the country, with not more than 3 per cent in any one city, it was pointed out.

The list, which includes the names and addresses of the trade and commercial organizations of the United States, is said to have proved of considerable benefit in directing individuals, factories and others interested in obtaining information concerning any commodity.

Practically every trade, industry, and profession now has one or more associations or cooperative organizations, the publication shows. There are trade associations and institutes embracing particular industries and occupations, chambers of commerce embracing representatives of many groups, labor unions representing the different crafts, associations embracing the professions, farmers' associations and cooperatives, and a great increase in municipal and community organizations for the general advancement of the community. More than 13,000 organizations, working for the benefit of their respective groups, are listed in the publication.

Never before in the history of commerce has there been such willingness on the part of individuals and private organizations to unite in working for the constructive upbuilding of commerce and industry through greater efficiency of each group of related interests, it was pointed out. The exchange of ideas and knowledge among competitors, which would have been considered commercial suicide or pure philanthropy at the beginning of the present century, is now considered mutually beneficial and constructive, a distinct contribution to higher business ethics, and a means of advancing daily the processes of production and distribution, it was said.

According to the Division, men are realizing that supplying the needs of the consumer is in essence a great cooperative effort, that success in industry and commerce is based not on taking advantage of other persons but on the efficient division of labor and exchange of products, it was explained.

The organizations listed in the 1929 edition represent an increase of nearly 45 per cent over the listings in the 1926 publication. It is believed that this increase represents a more complete listing rather than an increase in the number of organizations functioning. New associations have largely been offset by others which have gone out of existence or have been consolidated with some other organizations.

For the first time, it was pointed out, the secretaries of all national, international and interstate organizations are listed, though it is recognized that they are subject to frequent change. These organizations are also classified by commodities and services as well as alphabetically. State and local organizations are listed alphabetically.

In addition to the biannual edition, the division maintains a current file of the various organizations, which is available to all branches of industry, it was stated.

Truck Owners Organize in Badger State

W ISCONSIN'S truck interests, anticipating that the railroads will foster legislation which would limit competition by the motor vehicle operators when the 1931 Legislature convenes, have organized the Common Carriers' Truck Association and will employ a Legislative representative. At the organization meeting officers and directors were elected as follows:

President, Frederick Leicht, Leicht Transfer & Storage Co., Green Bay.

First Vice-Presidents, George H. Tiernan, Milwaukee, and Carl Timm, Janesville.

Secretary-Treasurer, Earl Cannon, Madison.

Directors, Earl Staunton, Eau Claire Warehouse Co., Eau Claire; George H. Tiernan, Milwaukee; Harry Elwell, Eau Claire; W. H. Richards, Sparta; E. G. Dowe, Beaver Dam; Earl Schultz, Janesville; Mason Gunsolus, Stoughton, and the president and the secretary.

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California Furniture Men May Seek to Go Under State Control

THE California Van & Storage Association is conducting an inquiry to determine the advantages and disadvantages of California Railroad Commission control of the household goods storage branch of the industry. Such control is now exercised over merchandise, cold storage and agricultural warehouses and franchise truck operators in California cities of more than 150,000 population.

At the July meeting of the southern division of the California V. & S. A. at the Elks Club in Los Angeles the subject was discussed by Don F. Harner, western representative of Distribution and Warehousing, from the viewpoint of the traffic manager. As traffic manager of Stewart Curtis Packers, Inc., he has had considerable experience with the Commission.

The main fact involved, Mr. Harner told the furniture warehousemen, was that such a move would tend to stabilize the warehouse industry by preventing over-expansion, because new storage companies would have to obtain certificates of public necessity and convenience.

If the furniture warehousemen elected to go under Commission control, Mr. Harner advised, they should file their original tariffs high enough so that they could be brought down later if desirable, as it would be difficult to secure permission to increase rates. He pointed out also that it would require State legislature to effect such Commission jurisdiction.

Those attending the Los Angeles meeting appeared to be unanimous that such action should be taken and it was suggested that similar approval be sought from the association's northern division.

It was agreed that should control be sought the step should be taken in a friendly way in cooperation with the merchandise warehouse and franchise truck operators so as not to disturb the present set-up involving those interests.

C. E. Turner, Monrovia, is chairman of the southern division's legislative committee conducting the inquiry.

Technique Required for Development of Trade Associations

DISTRIBUTION AND WAREHOUSING'S Washington Bureau, 1163 National Press Building.

WHY some trade associations fail was outlined by Philip P. Gott, assistant manager of the Trade Association Department of the Chamber of Commerce of the United States, at the annual meeting of the Wagonmen's Distributing Association in Washington on Aug. 12-15. After dwelling on notable contributions which such organizations have made to sounder business methods and better competitive conditions, Mr. Gott said:

"Associations, like industries, have failed. One of the writers on trade association activities has recently made the statement that the failure to realize that a trade association is a business with

unique problems of economic and human relationships, and that there is a special technique and experience necessary in organizing and conducting a trade association, just as there is in any other business activity, is one reason.

"This writer claims that nearly 40 per cent of the trade associations have failed for that reason. In other words, when you set up a trade association, recognize that the management of it requires a certain technique. If you employ an architect, you go to him because he has a certain training in his particular field, a certain technique, as it were. The employment of an executive to manage a trade association requires a certain technique just as it does in that of law, medicine or any one of the professions, and the trade association field is not a sinecure for a friend or a place for someone who has failed in any particular industry, or for some salesman who is out of a particular job at that particular moment.

"In other words, in enlarging an organization and employing a staff it is essential that the industry recognize that it is employing an individual to act as a coordinating agency for the entire industry and that individual must have a certain economic background and a recognition of the technique of trade association activities, and as such must be able to render the type of service that the industry requires.

"Another one of the reasons given for

Barrett-Cravens Multiple Truck

THE Barrett-Cravens Company, Chicago, announces production of a new multiple lift truck which is claimed to be unlike anything heretofore offered. Its



"exclusive features" are described as

Spring handle holdup, preventing the handle from falling to the floor.

Automatic releasing latch, which eliminates the handle from flying up.
Timken rolling bearings, assuring easy

rolling and steering.

Special long leverage lifting mecha-

nism, causing easier lift.

Gearing to the load, permitting a varation in lifting strokes.

the failure of some associations is that the trade association fails whose membership expects its sales problems to be solved, its competition to become lightened, its technical education to be developed, its public to become informed at no greater annual charge to each member than the expense of a salesman's evening's entertainment of a first class prospect. It is essential that sufficient money be put into the organization to carry out a carefully developed program.

"The well financed, the well organized, analytical, policy promoting, constructive, efficient trade association is an economic asset to business and to the public."

-Horace H. Herr.

Fire Thought Incendiary in Goodman Plant

FIRE thought to have been incendiary wrecked part of the interior of the Jersey City plant of the Goodman Warehouse Corp., Jersey City and Bayonne, N. J., on Aug. 7. About thirty-five lots of household goods were destroyed. The blaze was confined to the interior, and from the outside there was no visible evidence that there had been a fire.

The theory of incendiarism was based on circumstances involving reports received by "under cover" men working for the New York *Graphic*, a tabloid newspaper, in the latter's campaign against the showing of motion picture films of obscene character.

Some time prior to the fire the Hudson County, N. J., prosecutor, acting on information presented by the *Graphie*, seized films alleged to be obscene and stored them, in steel containers placed in Government ammunition cases, in a steel van on the fourth floor of the Goodman warehouse. On the two days before the fire the prosecutor and several of his assistants visited the warehouse and examined the films.

The *Graphic's* "under cover" agents received information to the effect that the owners of the films purposed to get them back at any cost, according to Nathan L. Goodman, secretary of the Goodman firm. Thereafter the fire was discovered, and the belief of the Hudson County authorities was that it was an effort to destroy the films.

Plant in Jersey City Receives First Goods

The first cargo of merchandise was delivered early in August at the rail-to-keep terminal being constructed by the Pennsylvania Dock & Warehouse Co., a Pennsylvania Railroad subsidiary, on the Hudson River waterfront in Jersey City, N. J.

The first unit, now virtually complete, contains one of the largest cold storage plants in the country. Pouring of concrete on the eighth and last floor of the second unit, to be a food mart, is under way. The third unit will be for manufacturing lofts.

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MOTOR FREIGHT

Ren. U. S. Patent Office

FOR the busy executive of a warehousing business who is keen to keep abreast of the times there are several important new things to think about in the field of motor freight. Developments are following one another at a rapid pace, and all have a distinct bearing on the cost and opportunities of handling the hauling requirements of any warehouse business, regardless of its size. There are many advancements being made on the manufacturers' side of the industry, and some of these will be discussed in this department, which is conducted

By Philip L. Sniffin

THIS MONTH

The Driver Is the Key Man—Here Are Some Ideas on Securing and Holding His Cooperation

W AREHOUSE executives are becoming more and more aware of the important part the driver plays in any attempt to develop improvement in the motor truck department.

In one company, for example, a strict policy has been adopted to insure that only the most capable drivers are employed. Every applicant who makes a favorable impression in an interview with the personnel officer and gives surface indications of being likely material, must submit a list of his previous activities, as far as employment is concerned, for a period of five years. The personnel officer, through letters and personal inquiry, checks up on the record—not in a casual and incidental way but in a systematic and thorough manner. Preference is invariably given to married men.

The two salient factors considered in each analysis center around the questions:

1. "Is he of a nature to yield to training and discipline, and to recognize and assume responsibility?"

2. "Does he actually want permanent employment?"

Experience as a driver is a minor point in an applicant's qualifications. The company's system calls for a thorough course of schooling before a man is given charge of a truck, and, while any previous experience in handling auto-

motive equipment is of value to him, it is not essential.

This rigid system may seem to many delivery executives to be carried to an unwarranted extreme. It is, however, typical of what a number of concerns within the writer's observation are doing. They are insisting that no man shall be placed in charge of an expensive truck investment unless he has demonstrated his ability to treat it properly.

Many delivery executives agree that every driver should be examined for imperfect vision, hearing or any physical ailments, such as heart trouble, nervous disorders, etc. Next his character and home life should be carefully scrutinized. A man who has an unhappy home environment will not make an efficient driver. A married man between the ages of 24 and 40 is generally considered to be the most dependable.

General intelligence is the driver's most important asset, and it is extremely unprofitable to hire a driver who lacks ordinary intelligence.

Some concerns are using psychological tests which may be applied to the driver-applicant in a few minutes. These tests reveal whether the driver is cautious or careless, what his general standard of intelligence is and whether he is dependable in a crisis. Short-comings in any of these qualities is sufficient reason for ineligibility.

ONE test is designed to find out the applicant's powers of attention, observation, memory, ability to follow directions, etc. He is required to glance over a sheet containing various figures, to describe them, to divide lines into various portions, to recognize opposites and similar problems. The applicant need not be an intellectual giant but he must be able to carry out simple directions, recognize objects under unusual conditions, learn simple things, and have a normal memory.

However, intelligence is not the only qualification for a safe driver. A man may have an alert mind and at the same time be habitually careless, or reckless. These two failings are largely a matter of habit and lack of training. To test the driver's, "bump of caution" he is taken into a room and told to handle certain objects and perform certain oper-

ations. The manner in which he follows directions and the time he requires fully to grasp the situation are carefully noted. To determine his presence of mind, he is told to operate an electrical board which is designed to give him an unexpected scare. He is cautioned beforehand that, should anything untoward develop, he should shut off the switch and step on what corresponds to the brake of a truck. The driver's quickness and steadiness under this test give an accurate estimate of his ability to meet the emergencies of modern street traffic.

Discipline

THE right kind of discipline needs a firm hand and cannot be compromised with soft-hearted methods.

A case in point is that of a concern in a large eastern city. This firm found that it was losing money through looseness in the direction of its drivers personnel. For reasons of policy the name of this company is being withheld. The drivers at this time were under the direct supervision of a sales manager who knew his business thoroughly but lacked the proper executive ability to get a hundred per cent efficiency from his force.

The sales manager was entirely too good-hearted.

Of course the drivers termed him a "good fellow" and avowed they would do anything within their power for him.

But therein lay the difficulty. Their good intentions ended with their avowals.

It was not long before they were taking advantage of his leniency. While the resulting lack of discipline was not through deliberate intention, human nature is such that it unconsciously follows the line of least resistance.

This situation continued until its gravity was brought before the eyes of the officers of the company. At first they could not understand the cause. The question of the quality of the general business service was investigated, with the thought that perhaps it had fallen below par; street supervisors made a study of territorial conditions to determine whether city development was responsible; overhead and administration were thoroughly searched in an effort to discover the flaw; finally every department except the sales department had passed over the dissecting table. Yet no tangible explanation was forthcoming.

The officers were balked. In their estimation there was really no need to carry the investigation any further, for the man in charge of the sales department was competent beyond a particle of doubt.

However, the department was examined. The explanation was found.

Executive discipline was lax; the driver-salesmen had become demoralized.

Leniency and weak enforcement of

rules and regulations were responsible. With all his perfect knowledge of the business and his good fellowship, the sales manager was rapidly putting the firm on the rocks. He lacked only one qualification, and that proved to be an expensive one: ability to handle the personnel.

The new sales manager upon taking over the reins was confronted with an overwhelming problem. Whipping into shape a demoralized organization was not the easiest thing in the world. At first, opposition met his every move. The men, long accustomed to the easy-going ways of former days, were opposed to any change. Explanations showing the necessity of reorganization were to no avail. They were set in their habits and resented the new order. They were being "imposed upon," etc. Obstacles, petty and serious, met the new manager at every side.

Courage and determination finally won out, though not until many of the men had quit or been discharged; but those who remained, and the newcomers, were made to recognize that obedience of all regulations to the letter would be strictly enforced.

Today the organization of this company is considered the strongest of its kind in the city. The labor turnover is unusually low; the men are contented and are making money.

Driver Dislikes

I T is almost impossible to get a good driver to work with poor, rundown or dirty equipment. Good clean trucks attract the same kind of drivers. Install a systematic method of keeping your vehicles clean and in good condition and you will inspire cleanliness and interest on the part of your driver force.

Drivers don't like to be changed from one truck to another, they prefer to drive one truck steadily; then they take more interest in their job and will take better care of the truck they regularly drive.

They don't like to be sent off to a poor start. Send the new driver out with one of experience for a few days, so he will get familiar with your methods.

They don't like to be reprimanded in the presence of others. If you have a positive reason to believe your chauffeur is getting careless, call him aside and talk with him as a friend. Be fair, but firm.

If pay day happens to fall on the day after a public holiday, they think a considerate employer would arrange to have wages paid the day before the holiday.

They don't like a boss who is unfair, or unreasonable, or one to whom they can't tell their troubles, real or imaginary.

Morale

SEVERAL concerns are finding they can increase driver efficiency by holding what they call "driver meetings" for their route men. These are usually dinners held in the evening during which driver problems are discussed. One Brooklyn organization recently held a "safety" meeting at which the drivers met a Traffic Court judge and heard his side of the story on traffic troubles. This company is holding meetings once a month, and they have helped from the start.

Here is another good idea which helps to reduce the accident liability: Any police officer will bear witness to the fact that no two stories of the same accident agree in detail. Experienced truck operators likewise know how difficult it is to get a clear idea of what occurred from the description turned in by the driver involved. To overcome this and arrive more or less at the

(Continued on next page)

Connecticut Mover's Novel Combination for Furniture and Passengers

S OMETHING of a novelty in vans has been placed in operation by F. T. Shirlock, a furniture mover in Torrington, Conn. It is a convertible bus-van body, illustrated herewith, for his new Autocar truck, and has two uses—trans-

port of household goods, and transport of school children.

Mr. Shirlock operates eight trucks in his general trucking and furniture mov-



ing business. Also he has the contract to take children to and from Torrington High School. With an Autocar salesman he planned a body which would pass the specifications of his State's Public Service Commission as a bus and at the same time be convertible into a furniture

The body, constructed by Carl Anderson of Shelton, Conn., is 14 feet long, 7 feet high and 6½ feet wide, without longitudinal sills and with cross sills of wood-filled channel steel. Side and end panels and rear doors are of Ply-metl. Windows are of conventional trolley car design, lowering into pockets. Seats are in four section units running lengthwise in the body are hardwood frame, upholstered seat and back. Entrance for bus is at rear through the center of a three-section door, using two removable steps.

Conversion from bus to van is accomplished in eight minutes. Seats are removed. Windows are lowered. Panels, two on each side, are fitted in outside and hardwood slat frames inside, closing the window space. The steps are removed and the rear thrown wide open by the three-section door.

Here is a truck which may point the way to a profitable side line!

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true facts of the case, the delivery superintendent of a Detroit firm has had made a mode of a street intersection incorporating a variety of corners and crossings, with street car trucks and a traffic tower.

On this are placed miniature street cars, automobiles and trucks which can be located as desired. When the driver is reporting an accident, this board is placed before him so that he can demonstrate the conditions and relative positions of the obstacles involved, and a truer comprehension of the facts of the case is obtained. On several occasions this model has been of great value in court.

Suggestions

ECOGNIZING that the accident problem is largely in the hands of the drivers, one concern in Los Angeles puts the following messages over to all drivers in the form of printed cards in the truck cab:

'Most accidents are avoidable. not excuse accidents which are plainly your fault."

"You are instructed to report any accident or damage to property of any nature. Violation of this rule will not be excused."

"Avoid all arguments with officers, pedestrians and drivers of other vehicles. You gain nothing by them and they may react against you. If any argument of any nature develops, hold your temper; explain, in a gentlemanly manner, your side of the argument. If your explanation does not satisfy the other party, inform him that you are not authorized to settle these questions, but are instructed to deliver your load and return; give him your name, truck number and truck license number, and ask him to report the incident to the If the occurtransportation manager. rence or accident is liable to be of a nature at all serious, obtain names of

all possible witnesses, and then be on your way.

The way to make the driver willing and anxious to do better is to create a spirit of stimulation, which is not as difficult as one might suppose. Operators who have been in the habit of calling down drivers in private should try the publicity method. This consists of posting in a prominent position every month the gasoline mileages obtained on each individual vehicle, and the tire averages, including bad calls, at longer periods, putting each man's name on the bulletin board with figures of performance, and perhaps remarks on the trend or comparison with the best results obtained. All this has a remarkably stimulating effect.

There is no need for an unpleasant interview with the delinquent drivers. Their mates attend to that and poke fun at those with poor showings.

An operator of more than ninety trucks, who instituted the bulletin board system some months ago, in nearly all cases increased his gasoline mileages from 100 to 200 per cent. A gentle "razz" by a man's mates is far more effective than an angry interview with the manager. The operator mentioned also carries this idea into the accident reports. Each month the names of the men involved in accidents are posted in large type on the board, and this has been found the best deterrent yet devised. It all resolves itself into an appreciation of that human fact that most men can be led where they cannot be driven, and being shamed into better effort by their fellows is a more potent incentive than being criticized into it by someone in authority.

Maintain Interest

THERE are many ways available for THERE are many ways the keeping drivers interested in their work. Perhaps the most satisfactory

method is the contest or bonus plan. One good way of working out a bonus plan is on a basis of merit and demerit points.

Something of this sort is not difficult to put in operation. Keep an individual account of each driver's record. Pay the standard local wage for the type of man you want and allow a bonus of so much per month payable to the driver if his merit and demerit points are within a specified average.

The following is a description of the way in which one firm has successfully carried out a plan of this kind:

An individual record is kept on each driver, to which the employee may have access in the office of the assistant manager. Credits are allowed for commendable acts, deeds of heroism and loyalty, good judgment in emergencies, and courtesy. Demerits are provided for on absence of these factors. An accumulation of 75 demerits results automatically in discharge from service. If extenuating circumstances exist, and under proper authority reinstatement is approved, it will be with 50 demerits against the employee's record. A second accumulation of 75 demerits will result in permanent discharge.

The merits are assigned on the following basis:

For meritorious service in avoiding accidents, or unusual assistance or good judgment in emergencies, or any commendable act out of the strict line of duty, 10 merits are credited, on authorization of the head of department. A clear record for six months wins 15

The demerits are given for the followna offenaca

ing offenses.	Offenses		
	1st	2nd	3rd
Missing route or reporting late for work	1	2	5
Discourtesy or altercation with customers	5 (ae)	10	10

Canadian Company's New Piece of Semi-Trailer Motor Equipment

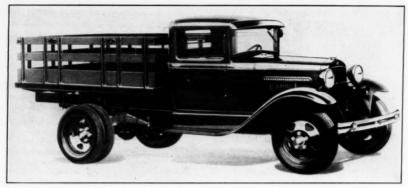
TIPPET-RICHARDSON, LTD., in the household goods warehouse business in Toronto, recently placed in operation a piece of semi-trailer motor equipment illustrated on this page. The truck is a Dodge Brothers 6-cylinder all-purpose chassis with a 130-inch wheelbase and a load capacity of 5940 pounds, costing, in Canada, \$1,700. The body, painted and letters, cost \$1,100; it has Ply-metl panels, white ash and oak, two side doors and aluminum moldings. The trailer chassis, costing \$750, is a Dominion Truck Co. Kitchener, 19 feet long overall, with 30 x 5 heavy-duty dual tires. The trailer chassis weighs 2300 pounds and the body 3118 pounds. Tractor, including fifth wheel and 45 gallons of gasoline, weighs 5220 pounds. Total weights are light, 10,600 pounds; and when fully loaded, 18,000 to 20,000 pounds. Gas consumption runs 13 to 14 miles to the gallon for level highway use. Average speed is 20 to 25 miles an hour,

according to size of load, on the level routes, being of course slower in hilly country.

Of the space within the body, 68 cubic feet is for the picture compartment, 104

is beneath the picture compartment, 148 is platform space in front of the picture compartment, and 797 is space in the van. Total, after deducting wheel boxes, 1100 cubic feet.





New Ford AA model with closed cab which is all steel and low in appearance. See text elsewhere for details.

	Offenses		
	1st	2nd	3rd
Smoking on duty	1	5	10
Reading on duty	1	5	10
Inattention to duty		3	5
Careless driving	1 5	10	10
Failure to report accidents or	U	10	10
defects coming to the atten-			
tion of those whose duty is personally to report such	5	10	10
Criticizing management or			
policy of the company except to superiors	10	10	10
Lack of neatness	2	5	5
Signals imperfectly given and	2	i)	9
respected	3	5	5
Violating speed regulations	3	5	10
Rough handling	5	10	10
Failure to have proper lights,	-		
and in working order	3	5	10
Violating overloading regula-			
tions	3	5	10

Court fines and accident expenses are demerited according to expense incurred and nature of each case.

The garage superintendent of this

company says:

"As an indication of how our merit system works out in one important respect, it may be interesting to note that 80 per cent of our drivers last year had no accidents of any variety-not even the scratch of a fender."

Truck Competition Railroads' Problem, I. C. C. Indicates

I T is not within the province or power of the Interstate Commerce Commission, nor is it in the interest of the public, to fix rail rates unduly low for short hauls largely for the purpose of eliminating motor truck competition.

The Commission recognized and stated this principle in the course of its recent decision handed down in connection with the Western Trunk Line Class rate case. It pointed out that under present conditions motor truck competition was primarily the railroads' problem and that the rail carriers apparently so regarded it.

The Commission declared that common carriers by motor truck were firmly established as a transportation need.

"There is so wide a difference between the inherent nature of the services offered by motor trucks and railroads that in many situations no conceivable rail rate could be so low as to attract an appreciable volume of less-carload business adapted to movement by motor

trucks," said the Commission. "Truck operators have heretofore generally adopted substantially the rail basis of rates for their charges, and there is no indication that they will depart from that practice if the rail rates are increased."

The comment of the Commission was based on evidence of State Commissions and shippers bearing upon motor truck competition with railroads in Western Trunk Line territory.

These interests expressed fear of possible detrimental, even disastrous, effect upon the railroads' revenues of motor truck competition if the Commission permitted increased rates. The Commission did increase the class rates

throughout the territory.

"Motor trucks are rapidly increasing in number and their routes are lengthening, especially where improved highways are available," said the Commission. "In Minnesota, and probably in sion. other States, trucks are sometimes equipped with refrigerating and heating devices for the protection of perishable ladings. Some common carriers by motor truck have established warehouses for the receipt and delivery of freight in small lots much like railroads, but for the most part they afford a satisfactory pick-up and delivery service. Their rates vary, but are usually made with relation to, or the same as, the corresponding rail rates, sometimes with the addition of a pick-up charge.

'Data are not available of the volume of tonnage moved by motor trucks but it seems to be considerable and constantly growing; and gross revenues are said to be substantial. Whether or not trucks are merely absorbing a part or all of the normal increase in less-carload traffic, or are making still deeper inroads into normal railroad class-rate tonnage, is not shown.

"The loss of less-than-carload tonnage to trucks appears to be largely confined to hauls for distances up to 75 miles, but in some instances up to 100 or 150 miles. The record does not definitely disclose to what extent the loss of this shorthaul less-than-carload traffic, the expensive character of which has been discussed . . . is of actual pecuniary disadvantage to respondents," the report

5 Vehicles Make a Fleet in Alabama

RESCINDING "for good and sufficient reasons" the ruling with respect to fleet insurance coverage of motor vehicles issued by the Alabama State Bureau of Insurance on April 2, 1928, George H. Thigpen, Alabama's State Superintendent of Insurance, has announced that the present Michigan ruling will apply in Alabama. Mr. Thigpen's new ruling reads:

"Five or more automobiles, or trucks owned and operated by individuals, partnerships or corporations shall constitute a fleet, with the exception that a car or truck privately owned but used in the business of an individual, partnership or corporation, may be included in a fleet for liability and property damage only; provided the premium is paid by such individual, partnership or corporation."

Recent Models

FEDERAL MOTOR TRUCK CO., Der troit: Model 4C6AB, illustrated on page — is a new Federal vehicle of 4 to 5 tons capacity. With 4-wheel air brakes built as an integral part of the chassis, it is designed primarily for modern heavy - duty, high - speed, cross - country hauling and is specially adapted to operation in hilly sections, to uses with trailer equipment and under conditions demanding unusually severe braking.

Air is supplied by a 2-cylinder compressor which is built into the motor and driven by a silent chain from the generator shaft. The control valve, connected to the foot pedal, is mounted on a heavy bracket attached to the chassis frame. A separate diaphragm actuates the brakes on each wheel.

The unit is equipped with a 6-cylinder overhead valve engine. The chassis is hung low, preventing side-sway at high speeds. There is a two-range 7-speed transmission, mounted amidship. The entire unit is fully inclosed.

There are seven wheelbase lengths-160, 168, 180, 192, 218 and 231 inches and a 144-inch for tractor service.

Ventilated disc-type wheels are used with single front and dual rear, and 36 x 8 tires are furnished as standard equip-

Ford Motor Co., Detroit: New Ford Model AA trucks and Model A light delivery cars are now on display by Ford dealers throughout the country. Changes in trucks are principally at the front end, which has been completely redesigned, and in the cab. Front lines resemble closely those of the improved passenger cars introduced last December; the radiator is higher, fenders are wide and flowing, and a black cowl stripe adds distinction.

Open or inclosed caps may be had which fit either the AA or the A. The inclosed is all steel, low in appearance yet with ample head room, with roof covered with double texture rubber top material, the cushions being trimmed in

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dark cobra grain artificial leather in plain panel style. The top of the open cab is of black rubber top material and is easily removed.

The AA, with improved 4-speed transmission, may be had with a platform body, which can be equipped with stakes, and a panel body. The A commercial cars comprise a light delivery type with pick-up body, a de luxe delivery, a small panel car, and a station wagon.

International Harvester Co., Chicago: A new ¾-ton special delivery truck has a 136-inch wheelbase and provides ample loading space for the mounting of 7, 8 or 9-foot bodies. It is powered with a 4-cylinder engine and is provided with 4-speed, shoe-type internal expanding brakes.

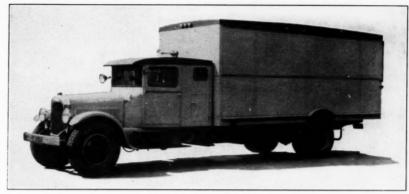
The frame, chassis and wheels are finished in red paint; the hood, cowl and cab in gray-green lacquer, and the fenders and running boards in black enamel. Stake bodies and express bodies are also finished in gray-green lacquer. When use is made of the panel body, the body, hood, cowl, and wheels are finished in a pleasing blue, with a lighter blue belt line around the body. The balance of the chassis is painted black. Cream striping on wheels and body contributes another brightening touch.

Studebaker-Pierce-Arrow Corp.: This company has been organized to manufacture and merchandise a complete line of Studebaker and Pierce-Arrow commercial vehicles. Pierce-Arrow heavyduty trucks will be announced later. Meanwhile the first units announced are Studebaker 1½-ton and 2-ton.

The 1½-ton is offered in two wheelbases, 130 and 160 inches, the respective f.o.b. prices being \$695 and \$775; and the 2-ton in wheelbases of 148 and 160 inches, with the respective prices \$895 and \$9045

Each is powered with a 6-cylinder 70-hp. truck engine of 205 cubic inches displacement. A heavy-duty transmission, with selective sliding gears, provides four speeds forward and one reverse. All standard body types are available with both chassis, including panel, screen, express, stake, canopy, grain, cattle and dump bodies.

White Company, Cleveland: Additions to the White line, designated as Models 63 and 64, are rated at 21/2 and 3 tons and are available in three and five wheelbases respectively. The powerplant of 63 comprises a 4 by 51/4-inch engine displacing 396 cubic inches and a 4-speed transmission, and service brakes are of the 4-wheel internal hydraulic type. The engine of 64, also unit mounted, has a 4%-inch bore, 5%-inch stroke and displaces 519 cubic inches, and has 4-speed transmission, and service brakes are of the internal 2-wheel type, operated by air, although 4-wheel air brakes are available at extra cost.



New to the Federal line of trucks—Model 4C6AB. 4 to 5 tons capacity. See text on opposite page for information.

Georgia Supreme Court Upholds State's Right to Tax Private Carriers

THE right of the Georgia Public Service Commission, representative of the State, to regulate and tax private motor carriers for hire was upheld by the Georgia Supreme Court on July 26 in the case of the Saye & Davis Transfer Co., which had attacked the State statute as unconstitutional. The decision reversed that of Judge E. D. Thomas of the Fulton Superior Court and dissolved an interlocutory injunction which he had granted against the Commission.

The Saye & Davis Company contended it was not under the Commission's jurisdiction by reason of not engaging in the business of a common carrier, transporting goods privately for five customers only. The Commission in reply contended that the company, even though a private carrier only, was subject to the regulation of the State's motor carrier Act of 1929 because the firm's business was affected with a public interest.

"The controlling point," said the Supreme Court in its decision, "is one not of differentiation, but public interest. If this transfer company can make contracts as a private carrier with five customers, it can just as lawfully do so with 500 others, and in each of the additional instances it would be as much a private carrier as before. The result would be that the State, which owns the highways, would be compelled to keep up the track used by this private carrier, maintain and repair it, and would be helpless when the carrier would tauntingly say, 'I used your road in my business and let the citizens of the State keep up my means of transportation.'

"Numerous Courts have decided that where the use of the highways is by one who conducts a business which affects the public interest, such business is subject to regulation by the State. The State has a proprietary right in and to its highways, and therefore has the power to prohibit or regulate and control the use of its highways for purposes of private gain."

In its decision the Supreme Court quoted rulings by Courts in various States and declared that so far as it was aware the Supreme Court of the United States had never held that, where the transportation business of a carrier was affected with a public interest, the State was without power to regulate such business in the use of the State's own highways.

By the various United States Supreme Court decisions which has been handed down, the Georgia Supreme Court set forth, the following conclusions concerning the regulation of private carriers seemed justified:

"1. Private carriers cannot, by Legislative command, be converted into public carriers; that is, the entire system of traditional common-carrier duties, including such obligation as continuity and equality of service, cannot be imposed.

"2. Where a statutory provision for certification of private carriers is not severable from other provisions improperly imposing common-carrier obligations, such a provision is invalid.

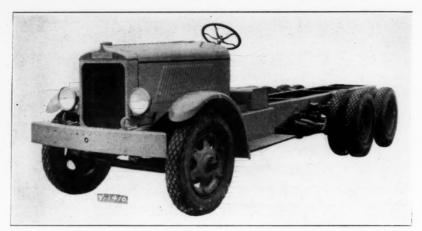
"3. Private carriers may be subjected to regulation appropriate to their status.

"4. There is no Supreme Court decision holding that private carriers may not appropriately be certified. The dissenting opinion in the Frost case insists that they may; the majority opinion points in the same direction."

Adams Truck Terminal Now in Operation

THE Adams Transfer & Storage Co., Kansas City, Mo., recently opened and is now operating its new union truck terminal of sixty-vehicle capacity. The modern fireproof station offers a service which is available to all shippers, warehouse firms and transportation companies wishing to take advantage of it.

Truck lines operating from this depot cover practically every mile of hard-surfaced roads reaching out of Kansas City for a distance of 300 miles to the west and southwest and 150 miles to the east and north. Daily service is given to 300 points in Missouri, Kansas and Oklahoma. To the west, the service extends to Salina, Kan.; to the southwest, to Wichita, Kan., Bartlesville, and Tulsa,



Illustrating one of the two new 6-wheel models of the 2-wheel drive type, announced by the Relay Motors Corporation, Lima, Ohio. The Relay pendulum suspension has been incorporated on all four of the rear wheels. These trucks have been developed primarily for highway freight operation. A basic feature of the Relay suspension especially important with the 2-wheel drive 6-wheeler is the fact that the upward swing of the load automatically increases the downward pressure on the wheels, greatly adding to the traction. The engine on both these models is a 6-cylinder removable L head type. The transmission is of the selective gear type mounted in unit with the clutch. There are five speeds forward and two reverse. There are two complete sets of brakes on each model operating independently. Service brakes are Lockheed hydraulic type, internal expanding, operating on all six wheels. Hand brake is external contracting on propeller shaft.

Okla.; and to the east, as far as Columbia and Jefferson City, Mo. Morning and afternoon deliveries are made to nearby points, and to more distant towns the service is overnight. Store-door delivery is made at destination.

An example of the regularity of the service is found in the case of service to Tulsa; this line has been in operation since July 15, and the regular schedule of trucks leaving the terminal at 6 p. m. and making store-door delivery at Tulsa next morning has been maintained ever since.

The general basis of charges is the interstate railroad freight rate, which includes store-door delivery at destination. A receipt is given on a standard form bill of lading, and in accepting shipments the Adams terminal takes on the liability of a common carrier, assuming the obligation of safe delivery of goods at destination. This is of immense advantage to shippers, who, when using the union truck terminal, are obliged to look to only one party for safe and efficient transportation.

The terminal itself is located conveniently next to the repair shop and garage and is of reinforced concrete construction featuring steel trusses which support the roof, thus leaving a floor clear of any obstructing columns or supports. A freight platform one block long extends down the center so that trucks may back to the platform on both sides and leave without interference. In the center is a checker's booth and office, as well as a waiting room for men searching for employment. Such facilities as automatic scales, skid platforms, wheel and jack-lift trucks are provided.

The trucking service has been and is a tremendous asset to shippers, providing terminal facilities hitherto lacking and stimulating extension of business in Kansas City trade territory for shippers, transfermen and warehousing companies. An indication of the extent of the influence the establishment of the terminal has given to distribution and warehousing is the fact that prior to the operation of the station only 50 points were being served contiguous to Kansas City. Now more than 300 towns and cities are included in the itinerary of the truck lines.

"Our idea in establishing our terminal," according to D. S. Adams, vice-president of the Adams firm, "was because the need of such a service was widely felt and the opportunity was present. The exigency demanded that someone take charge of the inter-city trucking business and place it on a sound substantial basis and develop it as a real transportation service for Kansas City shippers in this trade territory.

"We do not feel that we have any special advantage over any other warehouse because we operate the terminal; in fact, we invited and have received a nice volume of business from a number of local warehouses. We have developed a substantial and reliable service which other warehouses and interested parties can offer their customers and at the same time support a Kansas City institution.

"By facilitating the business of transportation by operating a convenient station, our new union depot protects, and provides an opportunity for, greater transport service for transfer companies. We expect and are receiving the loyal cooperation of a large number of firms engaged in interstate and inter-city cartage. There is no reason for opposition, as shippers merely deliver their loads to our terminal for truck transportation, the same as they would to a railroad terminal if they wanted rail service.

"It is not economically feasible for our company to make free pick-ups at point of origin, although we do give store-door delivery on arrival at destination. Most shippers are operating under contracts with transfer companies or use their own fleets for delivery service, finding that it is cheaper than to pay for pick-up service.

"Our terminal and inter-city business is increasing daily and we anticipate nothing but a successful regime under our present plan of operation."

Iowa Commission Fixes Rates for For-Hire Trucks

AN order establishing freight rates for motor trucks operating for public hire has been made public by Fred P. Woodruff, chairman of the Iowa Railroad Commission. The schedules, affecting about 1300 truck operators in eighteen northwestern counties of the State, recently went in effect, and Mr. Woodruff expressed opinion that "within a few years it is our expectation that tariffs will have to be established for all portions of the State for such traffic." He continued:

"The schedules were requested by the operators of the territory affected and establish minimum rates which are expected to stabilize the commercial trucking business.

"With the growth of the business, trucking rates naturally will take an important place in the deliberations of regulatory bodies.

"The new schedules apply in the territory where the commercial trucking business has been growing most rapidly because of the shipment by truck of livestock and dairy products to Sioux City. Establishment of livestock concentration points under the Federal Farm Board plan probably will result in rapid growth of the trucking business in other parts of the State and increase the demand fopublic hire rate regulation."

The schedule was promulgated under a new Act which gives the Railroad Commission power to regulate rates and operations of all operators of trucks offered for public hire over indeterminate routes, Mr. Woodruff explained.

A summary of the schedule, showing representative rates on a mileage basis, was announced as follows:

Class 1—Horses, mules, fat cattle, calves and hogs. Ten-mile haul, 9.6 cents per 100 pounds; 25 miles, 18.5 cents; 50 miles, 30.1 cents; 100 miles, 51.4 cents.

Class 2—Stocker and feeder cattle. Ten miles, 9 cents; 25 miles, 13.5 cents; 50 miles, 21 cents; 100 miles, 32.2 cents.

Class 3—Sheep, lambs and goats: Ten miles, 11.5 cents; 25 miles, 22.2 cents; 50 miles, 37.2 cents; 100 miles, 61.7 cents.

These rates apply over paved or graveled roads. An additional charge of .4 cent per mile for each mile of dirt road traveled is permitted for class 1 freight and 1 cent additional is permitted for class 2 freight.

The schedule also covers pianos and household goods. This portion was included to care for local hauling charges in and about Sioux City. The household nusing

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goods rates range from a minimum of \$19.10 for a 26-mile haul of 400 cubic feet of freight to \$65 for a 100-mile haul of 600 cubic feet.

The Meaning of Draw Bar Pull

DRAW bar pull is the foundation of all motor truck operation and must be considered whenever haulage requirements, and especially those including trailer equipment, are being computed, according to E. W. Winans, equipment engineer of the Federal Motor Truck Co. Draw bar pull can be illustrated as follows, Mr. Winans explains:

If a man took a small wagon and pulled it by attaching a peddler's spring scale to it, the pounds pull registered on this scale would be the draw bar pull necessary to move the wagon. The heavier the load on the wagon, the higher would be the reading on the scale. The draw bar pull would be less on a hard smooth surface and more on a gravel or sandy road. Ascending a grade would further increase in pounds pull the reading on the scale.

These different conditions, Mr. Winans states, are all met with in motor truck operation and the required horsepower generated by and transmitted to the engine, clutch, transmission and rear axle are the same whether the load is on the truck's own axles or whether the same gross load is pulled on a trailer.

The engine, of course, furnishes the propelling power and it is this power, translated into torque, the rear axle gear ratio, and the size of the rear tires, that are used in figuring draw bar pull. The gears in the rear axle reduce the road speed and increase the pulling power and should be selected according to the load to be carried and the condition and grade of the roads to be travelled. Torque is the constant pull or twisting effort on the flywheel exerted by the engine.

Specifically, draw bar pull equals the engine torque in inch pounds multiplied by the rear axle gear ratio divided by the wheel radius.

It requires about 30 pounds draw pull per ton to move a load on level paved roads. Therefore, if the load to be moved weighed 26 tons, including chassis, trailer and load, the first figure multiplied by the second would give 780 pounds draw bar pull required to pull the entire load on the level. If the draw bar pull available in the truck were 1420 pounds, it would leave a surplus of 640 pounds pull remaining to take care of hills, bad roads, wind resistance, etc. An extra 22 pounds pull per ton is required for each degree (1½%) of grade.

This example is given by Mr. Winans to show that there is a limit to the amount of load that can be pulled by a truck or tractor, the amount of load being governed entirely by the draw bar pull developed.

If a truck operator attempts to pull a load in excess of the known capacity of a truck or tractor, disappointment and financial failure will be the certain result.



The Moeller Transfer & Storage Co., Inc., Montgomery, Ala., recently placed this truck in the service of Allied Van Lines, Inc., of the National Furniture Warehousemen's Association. The chassis is a Model 65A White 6-cylinder bus type with air brakes, hydraulic shock absorbers and Goodyear balloon tires. The body is the Bender de luxe aluminum type, padded inside, with sleeping quarters inside the cab, and with capacity of 933 cubic feet.

B. & O. Discontinues Store Door Delivery When Rivals Protest

SHORTLY after the Baltimore & Ohio Railroad had, on July 15, as reported in the August issue of Distribution and Warehousing, inaugurated a coordinated rail-truck delivery service in New York City, the carrier discontinued the service in response to protests by various other railroads entering the city.

Thereafter representatives of the various railroads, the B. & O. inclusive, began a series of conferences in an effort to arrive at a plan which would be satisfactory to them all.

One attending officer said there appeared to be little hope of an early solution of the problem. The railroads had been studying it for years, he pointed out, and were further considering it with the idea that some method might be adopted in New York which could be used as a model in other cities.

N. Y. Central Seeks an Ohio Certificate

THE New York Central Railroad Co. has filed with the Ohio Public Service Commission an application to operate a motor haulage line between Toledo and Cleveland. The Ohio Association of Commercial Haulers, the Lake Shore Electric Railway and independent haulers have entered a protest against granting it.

The New York Central was recently prohibited from operating on this route, without a certificate of convenience and necessity, through the A. B. Peak Co. (See Leo T. Parker's report on this situation, on page 35.)

In a brief filed to support the new application the New York Central declares that the proposed service is obviously

benefit by way of expeditious movement of freight; that it is not an experiment but would be an operation of economy and efficiency backed by experience; that it would in no way be competitive with service now rendered by certificated haulers; and that the business is railroad business which would not accrue to the protesting truckers.

one from which the public would derive

Syracuse Terminal

A MOTOR freight terminal has been placed in operation in Syracuse, N. Y., by the Empire State Motor Express Co. The organization has a motor freight line tapping Auburn, Clyde, Seneca Falls, Syracuse and other cities.

New Haven Truck Plan

JOHN J. PELLEY, president of the New York, New Haven & Hartford Railroad, testifying before Interstate Commerce Commission Examiner John Howell at Hartford, Conn., on July 30, stated that the New Haven was in the trucking business to stay and would expend such service as far as the Commission permitted.

The road's policy, he declared, would be to replace with truck service as many local freight cars as possible in order not only to get back business lost to independent trucking concerns but also to keep existing traffic from falling off. He said truck operations had saved his company \$500,000 a year.

Penn. R. R. Truck Route

THE Baltimore Transfer Co., a subsidiary of the Pennsylvania Railroad, was granted a permit by the Maryland Public Service Commission on July 26 to operate a motor freight truck route from Baltimore and to establish such service to Stevensville, Grasonville, Queenstown, Centreville, Wye Mills, Queen Anne, Cordova and Easton. Certain other applications by the same company were denied.

"Who Gets the Business?"

ANSWER: "It's the Starred Listing that Gets the Business."
Therefore it pays to have a Starred listing.

Turn to page 20.

Chicago's Merchandise Mart Is a Combination **Building for Services**

(Concluded from page 18)

closed, being within the building. The platform is divided into sections by a fire-wall and shutters so that a fire can at once be closed off and confined to one section, thus preventing any spread to other areas.

The freight elevators are the "last in Westinghouse equipment. word" There are fourteen now installed, with room for more. Each elevator measures 9 by 18 feet and has a capacity of 10,000 pounds. They have a speed of 300 feet per minute and a combined normal carrying capacity of 52 tons, with guaranteed maximum carrying capacity of 661/2 tons. The combination of speed, capacity, and control of this group of elevators makes it possible to transport 52 tons of merchandise from the freight platform to the eighteenth (or top) floor of the sales section in about one minute.

The Security Fire Door Co., St. Louis, has installed 231 metal-clad "Seco" doors. This is one of the largest installations in the country in the past few years.

On the lower level the Chicago and North Western maintains an immense incoming and outgoing freight station, bringing the merchandise of the world right to the Mart building. Here cars can be unloaded as fast as they can be shunted in and out. Here also is a wide street-level concourse, not inclosed.

Another interesting feature is the direct connection which the C. & N. W. maintains with the Chicago Tunnel Co.'s underground system for the transport of merchandise to and from other freight stations and warehouses in the metropolitan area. Then, too, there is the dock frontage of 577 feet completely equipped with a tramrail conveyor system from the dock to the receiving platform, affording facilities by which shipments by water may be received and dispatched.

In fostering the erection of this gargantuan structure Marshall Field & Company have advanced many steps in the service of mankind. Indeed, the Merchandise Mart represents more than a huge building project utilizing air rights-proclaiming, as it were, a message of economy and efficiency in the handling, display, distribution and ware-

housing of merchandise.

The Cedar Chest and Fumigation

ABOUT "the latest wrinkle in advertis-ing and insurance" is a recent offer by a prominent manufacturer of cedar chests "to insure purchasers against moth damage to clothing stored in his chests," says a publicity statement issued at Washington by the National Lumber Manufacturers Association, 702 Transportation Building, that city.

"Policies in denominations of \$250, \$500 and \$1,000, depending on the price of the chest," the statement says, "will be furnished purchasers who apply within two years after it leaves the factory, when the insurance is automatically written up.

"Insurance against moths would prove ticklish business even for the ancient English underwriters. Every treatment presumed to prevent or to kill moths doesn't live up to promise. A good insecticide job can be done once or twice a year and with such chemical fumes hydrocyanic acid, sulphur, carbon disulphide, paradichloro-benzene, pyrethrum powder, carbon tetrachloride or an ethylene dichloride-carbon tetrachloride mixture, but in each case plenty of chemical must be used and the fumigating space must be carefully sealed. As a simple practical measure for the eradication of moths the U.S. Department of Agriculture has found substantially built chests and closets of Juniperus Virginiana or aromatic red cedar heartwood most expedient. It requires, as all moth eradication does, careful cleaning of goods before storage, and it will then positively kill the newly hatched or young larvae, which are the source of moth trouble.

"The Department also advises that the mere lining of chests and closets with a thin veneer of aromatic red cedar is insufficient. A full three-fourths inch of cedar should be used for bottom, sides and tops of chests or for interiors of closets, and they should be tightly built The oil from the cedar is an insecticide for the moths, and where there is enough wood to carry a sufficient quantity of oil, and where doors and lids are kept tight so that the oil fumes may get in their work, they become an effective specific against newly hatched or young

larvae."

State Cold Storage Opens in California

The California State Cold Storage Plant, on China Basin, San Francisco bay, opened for business the latter part of July and received its first consignments of California fresh fruits for pre-cooling pending shipment by water to foreign markets.

The building and equipment represent a cost of about \$300,000. There are seven cold storage rooms, providing storage capacity of 210,000 cubic feet. Speaking in terms of apples, this means facilities for handling 3,000 tons, or 90,000 boxes, at one time.

Vogelmeier Adopts Own Name for Firm

Announcement is made of the change of the name of the Newark Fireproof Storage & Transfer Co., Newark, Ohio, to the Phil Vogelmeier Co. There is to be no change in the firm's policies. The adoption of the new name was for convenience.

Phil Vogelmeier is president and operating executive, and a new name was thought to be more desirable because he is so well known to the people of New-

Erickson Is Again In National Chamber Distribution Group

THE "varied role which distribution plays in industry" will be brought under scrutiny during the current year by the newly-organized Domestic Distribution Department of the Chamber of Commerce of the United States, says a statement issued by the Chamber.

Elmer Erickson, vice-president of the Midland Warehouse & Transfer Co., Chicago, and general vice-president of the Warehousemen's Association, American has again been made a member of committee, which, the statement declares, "has laid out a comprehensive program looking to closer cooperation of distribution agencies in promotion of efficiency in meeting consumer requirements."

The committee's chairman is Fred R. Lazarus, Jr., secretary-treasurer of F. & R. Lazarus & Co., Columbus, Ohio. The other members, in addition to Mr. Erick-

Edward P. Peck, vice-president Omaha Elevator Co., Omaha.

Harry Black, president Black Hardware Co., Galveston.

A. H. Geuting, president A. H. Geuting Co., Philadelphia. W. T. Grant, chairman of board W.

T. Grant Co., New York .

Guy Gundaker, Philadelphia. Francis E. Kamper, C. J. Kamper

Grocery Co., Atlanta. Arthur Kramer, president A. Harris

& Co., Dallas.

W. P. Munger, president Burnham-Munger-Root Dry Goods Co., Kansas

W. N. Neff, president Vance Supply Co., Inc., Abingdon, Va.

H. W. Prentis, Jr., vice-president Armstrong Cork Co., Lancaster, Pa.

F. P. Valentine, assistant vice-president American Telegraph & Telephone Co., New York.

E. M. West, Dodd & West, New York. Arthur P. Williams, president R. C. Williams & Co., New York.

Yuma (Ariz.) to Have a Bonded Warehouse

Construction of a fireproof warehouse on Gila Street between Fourth and Fifth Streets, Yuma, Ariz., is being planned by the Yuma Bonded Warehouse Co. Articles of incorporation have been filed for the organization by Don L. Taylor, C. H. Trigg and Henry C. Kelly. company is incorporated for \$150,000 capital stock. The plant will have cold storage facilities.

New Milwaukee Incorporation

The Murphy Warehouse Co., Milwaukee, has filed articles of incorporation for the purpose of engaging in the general warehouse business. The company has been authorized to issue 80 shares of common stock at \$100 each. Signers of the articles are Leo Loftus, Peter Murphy, Jr., and P. F. Murphy.

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Merchants and Terminal Selected by A. G. M. A. as Philadelphia Centers

THE Merchants Warehouse Co. and the Terminal Warehouse Co. have been selected by the Associated Grocery Manufacturers of America as the two storage firms in Philadelphia to handle the products of the members of the A. G. M. A. Philadelphia is the first city in which the A. G. M. A. warehousing plan is introduced. As soon as the program is well under way there, according to James F. Brownlee, chairman of the organization's warehousing committee, "the plan will be rapidly extended to other cities."

The Merchants and the Terminal are both members of the merchandise division of the American Warehouseman's Association and of the Pennsylvania State Warehousemen's Association. The Merchants is identified with the American Chain of Warehouses and the Terminal with Distribution Service, Inc. Serving the purposes of the A. G. M. A., the River Front Stores of the Merchants firm will be utilized and the Brown Street plant of the Terminal.

The A. G. M. A. comprises more than 200 leading manufacturing companies, with many subsidiaries, having factories and offices in all parts of the United States. The merchandise involved includes canned foods, other food products in package form, coffee, tea, chocolate, beverages, extracts, sugar, baking powder, yeast, flour, spices and other condiments, together with soaps, cleaners, paper, polishing compounds and various household chemical products-in fact, virtually all articles sold in package form by individual and chain grocery stores. trade in these products in the Philadelphia district is declared to amount to hundreds of millions of dollars annually.

"Under the group warehousing plan," Mr. Brownlee said in announcing the Philadelphia selections, "the advantages, we believe, will prove to be very great. Up to the present time each manufacturer has selected his warehouse facilities without regard to the location of the warehouses of other grocery manufacturers, and wholesale buyers have had to send their trucks to a number of widely scattered warehouses in order to obtain everything required. Under the group plan a majority of all grocery products will be concentrated in two centrally located warehouses selected by the committee.

"This will not only reduce very materially the cost of trucking package foods and allied products but we expect that it will also have a perceptible effect in lessening the congestion of street vehicle traffic.

"Group warehousing will also permit the standardization of blanks and forms used in connection with the various transactions, which is a matter of considerable importance and offers scope for material economies. It will allow the warehouse managements to cooperate much more closely with their patrons in arranging for the most effective use of space. For example, it will facilitate distinguishing between fast-moving and slow-moving merchandise, and a better arrangement of stocks is thereby made practicable.

"From these warehouses the spot-stock needs of Philadelphia itself will be supplied and also those of the entire consuming region in southeastern Pennsylvania, southern New Jersey, Delaware and the eastern shore of Maryland, for which Philadelphia is the natural distributing center."

The headquarters of the A. G. M. A. is in the Graybar Building, 420 Lexington Avenue, New York City. Robert F. Miller at that address is executive vice-president.

Expansion in Pitt & Scott

The Pitt & Scott Corp., New York City, operating in London and Paris as Pitt & Scott, Ltd., and a member of the National Furniture Warehousemen's Association, has removed its New York City office to Rooms 401-405 at 27 Beaver Street and has announced the following affiliations in personnel:

E. G. Hinrichs, vice-president; L. C. Carpenter, manager trans-Pacific traffic, and W. F. Wagner, chief clerk. All three were formerly with the Trans-Continental Freight Co.

Franklin Co. Will Build

Announcement is made by B. F. Lenihan, president of the Franklin Fireproof Warehouses, Inc., Brooklyn, that a \$600,000 household goods storage depository will be erected by the company on Rockwell Place near Fulton Street. It will be a ten-story fireproof structure containing vaults for rugs and upholstered furniture, space for dead storage of automobiles, and a document storage department for financial institutions. The building is expected to be completed next March.

Mell Recovering From an Accident

Charles F. Mell, vice-president and general manager of the Great Lakes Terminal Warehouse Co., Toledo, is recovering from a serious automobile accident. While en route to Cedar Point, Ohio, on July 24, he was injured in a motor car mishap near Castalia and was removed to the Good Samaritan Hospital in Sandusky, where he was confined longer than a week before being taken to his Toledo home.

Colonel Mell suffered a dislocation of the left shoulder, a broken arm and cuts and bruises.

When you ship goods to a fellow warehouseman—use the annual Warehouse Directory.

Lady Congressman Will Campaign to Eliminate Moths

(Concluded from page 40)

noted from the home the control process must be continued to prevent their return.

Naphthalene and paradichlorobenzene are two of the best substances for controlling moths, he declared. Naphthalene is the material from which the common moth ball is made, but it is more effective in the form of flakes. One pound of flakes will give absolute protection to the contents of a trunk, he said, and one or two pounds in a closet will give complete protection if the closet is sealed or the door closed very tightly.

The best method of protecting against injury by fabric pests of all kinds is cold storage, according to the Department of Agriculture. Moths will not eat into paper to reach clothing, and careful wrapping of cloths in unbroken paper will give protection if the articles were free of moths when wrapped. Wrapping with several thicknesses of newspaper is sufficient if the ends are arranged so that the moths cannot crawl into the bundle.

Many substances often recommended for control of moths are worthless, according to the Department. These include tobacco extracts and powders in reasonable strength, lavender flowers, cayenne pepper, pyrethrum stems (dusted), powdered sulphur, borax, airslaked lime, salt, dried red cedar leaves, formaldehyde in a 1-to-10 solution, and sodium carbonate.

Milligan Now Labor Advisor

Ernest H. Milligan, treasurer and operating executive of Lee Brothers, Inc., New York, has accepted an appointment as the warehouse industry's representative on the advisory committee of the New York State Labor Department. Numerous bills which if enacted would affect the storage business originate with that department.

Missouri to Enforce New Corporation Law

Corporations foreign to Missouri but doing business within the State and which neglect or refuse to file amendments made to original articles of incorporation previously filed, and to pay the additional fees required, are subject to the imposition of a fine of not less than \$1,000, the Missouri Attorney General's office has advised the Corporation Supervisor, F. T. Stock.

Frisco Expansion

As a further step in its expansion program the Merchants Ice & Cold Storage Co., San Francisco, has applied to the State Railroad Commission for permission to increase capitalization from \$2,000,000 to \$6,000,000, the increase to be used for new equipment and extension of service.

Family Album Tells Story of the Career of Edwin Morton

(Concluded from page 31)

(Perhaps only one man has had a ware-housing career exceeding that of Mr. Morton, and he is said to be about to retire.)

An easy flight of stairs will take the caller to Mr. Morton's office—a fairly unusual thing for New York City with its high-powered elevators and 78th floor suites. And it is an unusual office for New York, too, for it is a corner room with six large windows on either side. That these windows are entirely covered with substantial wire netting is a tribute to the spirit of youth rampant in that waterfront neighborhood.

Mr. Morton is glad not to have spent his youth in New York City, he will tell you. Born in Cincinnati, he is happy to recall boyhood days in a smaller community. He has lost the thread of the life there now, of course, but he remembers "out where the west begins" as a comfortable, delightful place to live. He still is fond of the place. Mr. Morton has been in New York, at his present location, fifteen years.

He is a New Yorker now and, like so many other New Yorkers, he confines his activities to a small area of the city. Disliking the subways, he lives at an hotel within walking distance of his work. The big city left him no time to play golf excepting, on occasions, about once a week. A man cannot keep his game in good form playing once a week, so Mr. Morton gave up golf.

That a man who has no time for golf certainly has no time to get married, goes without saying. Mr. Morton is a bachelor.

It was as a lad of 18 that Mr. Morton got his first experience in the warehousing of merchandise, when he was employed by a large firm which had leased a building from the railroad in his natal city. Almost from the first he had charge of the storage end of the enterprise. The concern also stored wheat and other grains.

He also fought the firm's battles and he will tell you now that there is, indeed, nothing new under the sun. shipped goods in pool car lots back in the 80's just as they do now, he says, but conditions have changed, of course. The industry has grown larger, it has gained recognition, it is better organized. That they expect more of one nowadays and that too many people in his opinion, were lured into the industry by its war-time prosperity, is another story. Mr. Morton insists that customers now expect their warehouse to keep their books, keep their records, and all but sell their goods. And then they expect to dictate the price they will pay for services received.

In 1904, the Baltimore & Ohio Railroad completed the building of one of the largest and most complete warehouses in the West. This was in Mr. Morton's home town and he was invited to become its manager, a position which

he held for eleven years before being transferred to New York.

The New York warehouse is the key to a chain which comprises two units in New York, five in Baltimore, three or four in Cincinnati, one in Cleveland, one in Newark and several in other cities.

T. L. Mortons Have a Golden Wedding

Thomas L. Morton, secretary, treasurer and operating executive of the Model Storage Warehouses, Newark, N. J., and Mrs. Morton, who had the novel experience of twice being married within the space of about a month in 1880, recently celebrated their fiftieth anniversary of wedlock.

The day of the golden celebration was spent with their son, Walter A. Morton, the firm's president, and three grand-children, including twins, at Walter A. Morton's home at Spring Lake, N. J., and it was a day made memorable also by reason of the fact that telegrams and letters of felicitation poured in from warehouse friends all over the country, more than a hundred such messages being received.

Mrs. Morton, a half-century ago, was a Chicago girl whose parents were about to take her to Europe. Just before they sailed, the family visited Boston. Mr. Morton went there quietly and there was a secret wedding with civil ceremony. When this was discovered subsequently there was a church wedding.

Mr. Morton is a past president of the New Jersey Furniture Warehousemen's Association, of which he is now president emeritus. He has been active in the affairs of the National Furniture Warehousemen's Association, at one time serving as chairman of the nominating committee.

Stockton Now Acquires Local Lawrence Plant

The Stockton Wharf & Warehouse Co., Stockton, Cal., has been authorized by the State Railroad Commission to acquire the local warehouse business of the Lawrence Warehouse Co., which has its headquarters in San Francisco.

The Lawrence firm leased the Stockton property to the Stockton company on Aug. 28, 1929, for a two-year period. The controlling interest in the Stockton firm has recently changed hands, and the Commission has set aside the lease authorization to permit full acquisition.

Earn a STAR

C IVE your company's listing, in the 1931 Warehouse Directory, added value by having the information notaried, thereby assuring its serious consideration when consulted by shippers. Turn to page 20.

Truck Makers Warn Against Unjust Taxes

PROMPT steps must be taken to block legislative programs which involve unjust motor vehicle taxation, according to M. L. Pulcher, president of the Federal Motor Truck Co., Detroit.

"With all its recognized indispensability," he says, "commercial haulage is apparently regarded by legislators in many States as merely a target for excessive and unjust taxation. Motor trucks, all told, aggregate about 13 per cent of the nation's automotive vehicles, but are paying more than 25 per cent of the total receipts for all automotive equipment.

"Imagine where highway development would be today were it not for the help contributed by motor trucks. Yet it seems to be the opinion of many State officials that trucks should not be permitted to use the roads which they have been so unjustly taxed to build and maintain. In many sections of the country plans are under way to heap added taxation burdens on users of commercial haulers.

"In half a dozen States the tax on larger trucks is more than \$1,000 each, and in about fifteen States it ranges from \$500 to \$1,000. . . .

"How much longer will the users of commercial haulers stand by and permit a continuance of the program of unjust legislation aimed directly at their interests? Every State in the Union could hurl into action a force that would make itself felt in the camps of the lawmakers. Some have already swung into action and have tasted the fruits of victory. Success all along the line will surely come from thorough organization and proper fighting spirit. Such effort will win for commercial haulage users respect, consideration and justice in the matter of taxation. The time to act is now."

In the opinion of Walter A. Bermingham of the Diamond T Motor Car Co., Chicago, the "big job" is "along lines of educating both our legislators and the public." He says:

"We must show how the motor truck touches vitally every phase of our business and personal life, whether we live in the city or on the farm. Higher taxation means either legislating trucks out of existence or else raising the cost of haulage and ultimately the cost of goods to the consumer, either of which extremes is unfair and unthinkable. Exorbitant taxation is a short-sighted policy.

"Commercial motor vehicles deserve more kindly consideration today than ever before by local and State authorities. They are equipped almost universally with pneumatic tires. They are better built for safe, quiet and enduring performance. Trucks are not road-destroying, recklessly operated juggernauts but an irreplaceable link in modern transportation."

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"My first INTERNATIONAL operated so much cheaper than any truck I had ever owned that I decided to STANDARDIZE ON INTERNATIONAL TRUCKS." . . . H. J. Smith



Memphis, Tenn., June 30, 1930

International Harvester Company of America, Memphis, Tenn.

Gentlemen:

On February 23rd, 1929, I purchased my first International Truck, a Six-Speed Special. This truck operated so much cheaper than any truck I had ever owned that I decided to standardize on International Trucks.

The Model A-5 I purchased recently is, to my mind, the finest piece of motor truck equipment on the American market today. The attractive lines, ease of handling, and exceptional performance make it a pleasure to operate.

I am averaging 9.6 miles to the gallon of gasoline, hauling an average net pay load of 7,000 pounds. My average speed is about 35 miles per hour, however, I drove from Minneapolis, Minn., to Memphis, Tenn., in 42 hours recently, hauling 7,000 pounds of furniture and fighting a strong head wind. The body of my truck is 18 feet long, 7 feet wide and 7 feet high inside.

I am writing this letter without any solicitation on your part and will be glad to give any user the benefit of my experience if you care to have them call me.

Yours very truly, ABBOTT-SMITH STORAGE & VAN CO. (Signed) H. J. Smith, Mgr.

The two Internationals mentioned and praised in Mr. Smith's letter (the Six-Speed Special and the new Model A-5 Speed Truck) are included in the complete International line . . . a line of trucks ranging in capacity from the "Special Delivery" up to the big 5-ton Heavy-Duty Truck. See listing at the right for essential facts concerning four new Speed Trucks recently announced.

INTERNATIONAL HARVESTER COMPANY

of AMERICA

606 So. Michigan Ave.

(Incorporated)

Chicago, Ill.

See These Four NEW INTERNATIONAL SPEED TRUCKS

Model AL-3 $-1\frac{1}{2}$ tons

6 cylinders—4 speeds forward—138", 152", and 164" wheelbases—Spiral bevel drive.

Model A-4-2 tons

6 cylinders—5 speeds forward—145", 156", 170", and 185" wheelbases—Spiral bevel drive.

Model A-5-3 tons

6 cylinders—5 speeds forward—140", 156", 170", 190", and 210" wheelbases—Spiral bevel drive.

Model A-6—3 tons

6 cylinders—5 speeds forward—140", 156", 170", 190", and 210" wheelbases—Double reduction drive.

INTERNATIONAL TRUCKS

Weicker Co. Sets Up Motor Freight System **Throughout Colorado**

THE Weicker Transfer & Storage control of the Meicker Transfer & Storage extensively the motor freight business through acquisition of three already established and profitable truck linesthe White Motor Express, the Northern Transportation Lines, and the Camel Truck Lines, with a combined total consecutive mileage of 320 extending across

Colorado.

The combined lines form the backbone of a motor transportation system for the State; for, beginning at Greeley on the north, the line extends through Denver, south to Colorado Springs and Pueblo, and thence east to Rocky Ford, La Junta, Las Animas and intervening points to Lamar, which is near the State's eastern line. Through connections at these various points it is possible for shippers to send goods from all to all parts of Colorado and into adjoining States.

Up to May 24 the Weicker company had about fifty pieces of motorized equipment most of which was idle and productive of no revenue. The establishment of the motor freight system has solved that problem. Inasmuch as the equipment of the three truck lines operates for the most part at night, it is practical to use much of the combined equipment of the Weicker warehouse firm and the Weicker Transportation Co. (operator of the motor freight system) on local work in the daytime and on line

work at night. "We may send a truck out of Denver for Pueblo at 6 o'clock in the evening," according to Robert v-H. Work, vicepresident and general manager of the newly formed transportation company, "and it will return to Denver, after a round trip of approximately 240 miles, by 7 o'clock in the morning. It is then run through the shops and checked over, and placed in local service-with a new driver, of course. After the day's work, the truck may again be assigned to a trip to Pueblo, or some other point, that night."

Thus it is possible for the two companies to operate with less equipment each and make every piece of equipment earn more. Also it gives the Weicker Transportation Co. the facilities of any of the special equipment owned and operated by the Weicker Transfer & Storage Co. Altogether the combined companies now have a fleet of about 90 pieces, capable of hauling and handling almost anything that the public has to move, either in the city of Denver, or from one town to another along the routes for which the Weicker Transportation Co. has permits from the Public Utilities Commission.

Following purchase of the three truck lines, Mr. Work has been changing the color schemes of the trucks and is fast increasing the number of trucks and semi-trailers in order to permit quicker return of the equipment from the various depots to Denver where they can be placed in local service in the daytime.

The color scheme is predominantly white so that the equipment may be more readily discerned at night and therefore less hazardous to other traffic. There is a two-foot band of the characteristic Weicker brown for the lower part of the body. This is surmounted by a two-inch band of black, and the remainder of the body is white. The interiors of the trucks also are painted white, as this makes it easier to see when loading and unloading, for all of the trucks are covered.

Instead of permitting the line trucks to distribute and pick up merchandise at the various terminals-Pueblo, Lamar, Colorado Springs, Greeley and Denverthe firm maintains depots at each point and has a number of small, light trucks assigned to pick up work, except when there is a full load of merchandise to go to one or two consignees, or to be picked up from one or two consignors. Then the line trucks are used to reduce handling costs.

At the terminal depots are bed-rooms for the truck drivers, who may get a few hours of sleep while the depot crews are unloading their trucks and then loading them for the trip back to Denver. A sufficient amount of sleep is required of all truck drivers, according to Mr. Work, because it takes a cat-nap of but a few seconds on the road to run the truck into the ditch and cause hundreds of dollars worth of damage, with the possibility of death to the driver or injury and death to others on the road. And, while the drivers are paid by the trip, to encourage them to make as many trips as possible in a month, nevertheless no driver is permitted to take a truck out unless he has had sufficient rest. Therefore it is seldom that a driver makes two round trips to Pueblo in succession.

Another economy will result in the arrangement of the docks in Denver. Heretofore the three truck lines entered a covered garage and backed up at platforms where local trucks previously had deposited merchandise to be shipped. Always there was congestion in the place and it took a large crew to handle the goods. The transportation company has built docks and platforms in conjunction with the Weicker warehouse, the arrangement of which permits the pick-up trucks and the trucks of consignors to back up on one side and unload, whereupon the goods are moved across to the other side and loaded onto the company trucks. This dock is 24 feet wide and has eight doors on each side to accommodate eight trucks at a time for loading and the same number for unloading. Scales and check shanties are conveniently placed. At either end is an overhead trolley system which permits moving of heavy articles with block and tackle from one truck, across the platform to another, with a minimum of labor. The platform may be entirely closed, if desired, in stormy weather, while there is a canopy extending 16 feet over the truck platform to permit loading and unloading under partial shelter.

As it is desirable to keep the trucks (Concluded on page 58)

Death Removes Edwin P. Adams of Kansas City

E DWIN PORTER ADAMS, founder and president of the Adams Transfer & Storage Co., Kansas City, Mo., died at his home on Aug. 1 at the age of 72 years. He had been ill about two years and had retired from active participation in the business.

Prior to arriving in Kansas City and forming the firm which bears his name, about thirty years ago, Mr. Adams had been Kansas City general agent for the Adams Express Co. and had been connected also with the Wells Fargo express interests for a number of years at various points in the West. Before his retirement due to ill-health he had been

Edwin Porter Adams



Kansas City storage executive who died on Aug. 4 at age of 72

active in the Kansas City Chamber of Commerce and in other civic affairs.

Mr. Adams is survived by his widow; a son, D. S. Adams, the firm's vice-president and general manager; a daughter, Mrs. Paul Scott Mowrer, of Paris, France, and two grandsons, children of Mrs. Mowrer. Mr. Mowrer is internationally known as a newspaper correspondent.

Mr. Adams was a member of the merchandise division of the American Warehousemen's Association, the Missouri Warehousemen's Association, the Kansas City Warehousemen's Association and the Team & Motor Truck Owners' Association of Greater Kansas City.

> STAR your listing in the 1931 Warehouse Directory. Turn to page 20

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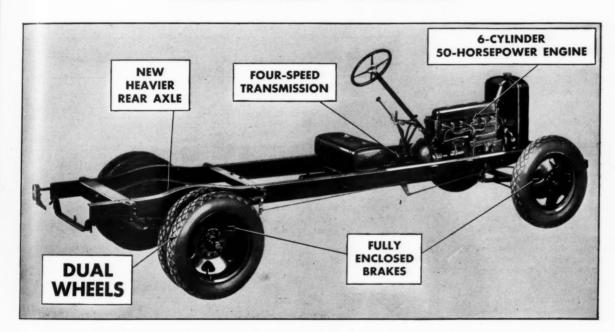
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Chevrolet A NEW 6-cylinder Truck

with Dual Wheels



To those thousands of truck users who want a big, rugged, powerful haulage unit of unexcelled economy-Chevrolet has this important message: A new six-cylinder 1½-ton Chevrolet truck—with dual wheels—is now ready for service!

In everything that makes a truck more useful-

more profitable-and more desirable-this new Chevrolet excels. It offers advantages in performance, in dependability, in economy and in good looks that are new to the low-price commercial car field!

Of special importance in many types of heavy-duty hauling is the new dual wheel equipmentof sturdy web-type design. This equipment is now available at only slight additional cost, and includes a set of six truck-type cord tires.

Another valuable feature is the new rear axlebigger, heavier, more durable. Still others are the unusually large and completely enclosed brakesthe double-steel channel frame—the four-speed transmission. And Chevrolet's now-famous 50-

horsepower valve-in-head sixcylinder engine provides the smooth, powerful, economical performance that modern trucking conditions demand.

If you are interested in buying a low-priced truck, there is all the more reason-today-why it's wise to choose a six-cylinder Chevrolet. Your nearest Chevrolet dealer will be glad to give you a trial load demonstration any time.

Roadster Delivery \$440 (Pick-up box extra) Sedan Delivery \$595 All prices f. o. b. Flint, Michigan

CHEVROLET MOTOR COMPANY, DETROIT, MICHIGAN, Division of General Motors Corporation

UTILITY 11/2-TON CHASSIS

Dual Wheels \$25 Extra

Light Delivery Chassis . . . \$365 11/2-Ton Chassis with Cab \$625

CHOOSE

Weicker Co. Sets Up Motor Freight System Throughout Colorado

(Concluded from page 56)

in operation as many hours of the day as possible and as many days out of each month as advisable, the servicing of the equipment is an important feature.

When a truck returns from a round trip it is run over the grease pit and greased. The greasers also inspect it for loose nuts and bolts. Then the mechanics check it over for electrical and mechanical troubles. The brakes are tested and any troubles reported by the driver are remedied. Willis Jones, in charge of the company's shops and garages, declares that, regardless of what the driver says about the condition of the truck, it is thoroughly checked over.

"A driver may report that the truck is working perfectly," according to Mr. Jones, "but we go over it anyway and we always find something that needs fixing: I have never known it to fail.

"The tires are checked after every trip, too. The oil is changed at regular intervals and valves are likewise ground at regular intervals, according to the make of the truck and our previous experience with it. Trucks which are driven by everybody and have no special driver have their valves ground after every 3500 to 5000 miles. With a new truck we touch up the valves after it has been driven 3500 miles, whereupon we observe the condition, and, if it looks as though the truck could run longer without valve attention, we increase the mileage and gradually work it up until we find the exact point where valve grinding should be done. After that the records will disclose when that truck should receive attention."

Tools and equipment, such as ropes. dollies, bars and chains, of each truck are checked in and out by the shop foreman, or his assistant, in the presence of the driver. In checking the equipment out, the driver signs for it and if it is missing when he checks in—well, he's just out the price of it. This system is advisable, according to Mr. Work, to make it certain that the driver will have all of the tools and equipment he might need on the trip to make emergency repairs, to change tires, and to insure the proper care of the contents of the truck.

Besides the regular run of merchandise, there are some special jobs which the company is handling. One of them is operating what is known as the "Cake Truck" between Denver and Pueblo, to distribute the product of one of the Denver bakeries. This truck always has a full load and has a fast schedule that must be met every night. Another job is that of hauling the newspapers of one of the Denver publishers to points in northern and southern Colorado and into Wyoming. This is a daily job, while on Sunday, owing to the size of the Sunday paper, fourteen trucks are required, for there are several tons of papers to go to some points in southern Colorado,

and many tons go into northern Colorado and southern Wyoming.

A Different McKinley Co.

Caption under illustration of a Highway Trailer Company van trailer, on page 48 of the July issue of Distribution and Warehousing, informed readers that the equipment pictured was being operated by the McKinley Storage & Transfer Co., Canton, Ohio, with the result that the Canton firm received more than fifty letters from storage executives interested in knowing further details.

It is not the McKinley company in Canton which owns the trailer illustrated. It is the McKinley Moving & Storage Co. at 104 North Washington Avenue, Royal Oak, Mich., a suburb of Detroit.

Carley Joins Powers Firm

Frank M. Carley, formerly vice-president and general manager of the Empire Freight Company of New York, Inc., and who recently resigned from that organization, is now associated in an executive capacity with the M. H. Powers Company, Inc., 124-126 East 121st Street.

The Powers firm does a household goods and merchandise warehouse business and deals in new furniture.

Fire in Manteca

Fire of undetermined origin destroyed the building of the Manteca Warehouse Co., Manteca, Cal., on Aug. 5. The loss was estimated at \$10,000.

Trenton Company Stages American Fair Exhibit

HEREWITH is illustrated one of the attractive and distinctive displays at the American Fair in Atlantic City's new auditorium during the month and ten days ended Aug. 27. The Trenton Chamber of Commerce urged Trenton business interests to be represented, and among those who responded was C. Lewis Lavine, president of the Prospect Warehouses, Inc., and head of C. Lewis Lavine, Inc., operating an interstate motor freight service.

The Lavine booth caught the intimate spirit of the event, which, national in scope, is designed fundamentally to duplicate the famous Leipzig Fair in Germany. Mr. Lavine utilized a group of about

twenty-five miniature motor trucks, exact duplicates of the units which comprise his fleet. These tiny vehicles, complete with rubber tires and modern accessories, were loaded with standard products, likewise in perfect miniature, as manufactured by some of New Jersey's leading industries—linoleum by W. & J. Sloane; wire cloth and fencing by the John A. Roebling's Sons Co.; electric lamp boxes by the Westinghouse Lamp Co.; rubber goods by the Murray Rubber Co., and porcelain specialties, chinaware, etc by ceramic plants.

The fair was attended by visitors estimated to number half a million.



Miniature vehicles loaded with miniature goods featured display of Lavine warehousing and trucking organization at American Fair in Atlantic City

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Before and AFTER Six-wheeling

BEFORE...This old 31/2 ton Autocar with wood wheels, solid tires and short body was carrying 5

TO meet the nation-wide demand for 6-wheel attachments, we have established a nation-wide distributor organization to furnish and install UTILITY 6-wheel attachments with Single or Dual, Solid or Pneumatic Tires, with or without Brakes. Write the nearest UTILITY distributor for illustrated folder:

WESTERN DISTRIBUTORS

Fresno: Larsen and Krog, Fresno and E Sts.

Honolulu: Schuman Carriage Co.. Ltd.

Honolulu: Universal Motor Company, Ltd.

Los Angeles: Utility Trailer Sales Co., 1600 S. San Pedro St.

Phoenix: . . . Paul Bennett Auto Supply Company,

326 North Central Ave.

Portland: . Murry Jacobs Company, 575 Vancouver Ave. San Francisco: . Utility Trailer Sales Co., 1242 Mission St. Seattle: . . Murry Jacobs Company, 528 First Ave. South Spokane: . Murry Jacobs Company, 814 West Second Ave.

The whole country is going 6-wheel! Truck owners and operators everywhere hail it as a new era of doubling truck loads and reducing ton-mile costs with a final result of very much increased profits.



AFTER... The installation of UTILITY 6-wheel attachment with dual pneumatic tires allowed extending the body to 16 ft., which made possible an 8 to 10 ton carrying capacity.

EASTERN DISTRIBUTORS

Baltimore: Maryland Truck Equipment Corp. 401 E. Centre St.

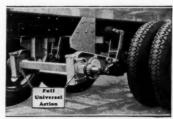
Boston: . . Perin-Walsh Company, 1540 Columbus Ave. Buffalo: . . . Frey, The Wheelman, Inc., 520 Ellicott St. Chicago: . Schukraft and Company, 1201 Washington Blvd. Cleveland: Truck Engineering Corporation, 1802 E. 38th St. Council Bluffs: Omaha Standard Body Co., 2411 W. Broadway Dallas: . Leland Equipment Company, 1916 Canton St. Decatur: . The Herman Body Co., E. Prairie & Hilton Sts. El Paso: . Walter E. Pofahl, Myrtle Ave. & Campbell St. Houston: . . SABCO Sales Company, 1101 Franklin Ave. Indianapolis: Indiana Wheel and Rim Co., 34 W. North St. Kansas City: National Steel Products Co., 1611 Crystal Ave. Long Island City: . . . Interboro Hoist & Body Corp. Borden Ave. and Van Dam St.

New Haven: . . . The Connecticut Wheel & Rim Co. 663 Chapel St.

Oklahoma City: . Leland Equipment Co., 1321 S. Agnew St. Richmond: . . Dixie Wheel Company, 723 W. Broad St. San Antonio: . San Antonio Body Co., 823 Roosevelt Ave. St. Louis: The Herman Body Company, 4420 Clayton Ave. Tulsa: . Leland Equipment Co., Archer and Guthrie Sts. Washington: . . . Maryland Truck Equipment Corp., 1050 30th St. N. W.

UTILITY 6-Wheel Attachments

UTILITY TRAILER MANUFACTURING CO.



UTILITY 6-wheel Attachment for single or dual tires with or without brakes.

Box 1407. Arcade Station. Los Angeles or dual tires of when WRITING ADVERTISERS MENTION DISTRIBUTION AND WAREHOUSING

Brooklyn Warehouse Is to Liquidate as City Buys Land for Subway

THE Brooklyn Warehouse & Storage Co., one of the industry's foremost firms in New York City, is going out of business after a successful career of nearly forty years. Its contents, valued at several million dollars, the furniture alone being insured for more than a million, are being placed in other depositories in Brooklyn and Manhattan, the doors will be closed by Oct. 31, and the company will liquidate by the first of the year.

The building, the first fireproof warehouse erected in Brooklyn, and containing 250,000 square feet of storage space, will be torn down to make way for one of the new subway extensions. The city purchased the property for a reported consideration of \$1,100,000. Resembling a fortress in appearance, the structure is considered by real estate experts as the heaviest building for its size in the East. It rises nine stories and is entirely of brick, with steel girders, and was built to be "fire, flood, riot and weather proof" when it went up in 1892-94.

In the 700 rooms and the vaults and other compartments there were 2500 van loads of goods before removals were started. There were furniture and business records and silverware and a varied list of commodities, as the firm did also

Crescent Announces New Industrial Lift Truck for Skid Use

A NEW type of electric industrial power lift truck, designed for use with hand truck platform skids of 7 in. high or more, is announced by the Crescent Truck Company, Lebanon, Pa. It is intended to fit into a field between the larger and heavier industrial trucks and the ordinary hand lift truck.

The operating costs of the new unit, according to the manufacturers, is less than 18 cents an hour, including depreciation, interest on investment, repairs, maintenance, replacement of batteries, etc.—everything but the operator's wages.

The general specifications include: capacity, 3,500 pounds; overall length, 88 inches; overall width, 33 inches; turning radius, 7 feet; drive, spur gear drive with a reduction of 19 to 1; driving and elevator motors, General Electric; lifting platform, 20 inches wide and 40 inches long; control, 2 speeds forward and 2 speeds reverse, with brake foot pedal interlocked with control mechanism; bushings, all moving parts bronze bushed and provided with Alemite fittings; batteries, standard Exide or Edison assembly. Fafnir ball bearings or Timken roller bearings are used throughout, and other features include cantilever spring suspension on the driving unit; rubber tires on all four wheels; 3 inches underneath clearance, and a 31/4-inch lift.

some merchandise storage. All these are going into other warehouses—some by contract and others at the dictation of customers.

Most of the clerical staff and the warehouse labor, comprising a personnel of about seventy-five, are being given positions, particularly the old-timers, by other warehouse companies.

The officers of the firm are largely men who are identified with other business interests in Brooklyn, and the executive management has been almost entirely in the hands of Harry W. Wastie, the manager, who is nationally known in warehousing by reason of his activities in association affairs. fall he was elected president of the Furniture Warehousemen's Association of Brooklyn and Long Island, now the Brooklyn branch of the New York Furniture Warehousemen's Association, and he is a member also of the National Furniture Warehousemen's Association and of the merchandise division of the American Warehousemen's Association. He has frequently attended the national conventions in various parts of the coun-

Mr. Wastie's future plans are uncertain at this time. He intends to continue his connection with warehousing and has several proposals under consideration.

Work Begun on Crooks Plant

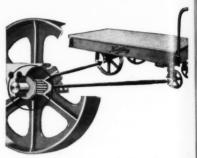
Construction has been started on the new storage structure of the Crooks Terminal Warehouses at Union Avenue and Santa Fe Street in the central industrial district of Kansas City, Mo. Five stories high and 162 by 120 feet in ground area, it will be the firm's third unit in that section and will cost about \$250,000. The firm expects to take occupancy early in October.

Roller Bearings Now Standard on Nutting Trucks

ANNOUNCEMENT is made by the Nutting Truck Co., Faribault, Minn, that all its wheels and casters now have Nutting roller bearings as standard equipment.

"This important new feature," says the statement, "means easier starting, capacity loads easily handled, speeding up of the work, and often the saving of one man on heavy loads."

Roller bearings on floor trucks, it is



claimed, "frequently may take the place of extra help on the payroll."

Some time ago the company introduced special semi-steel castings on all cast parts of its trucks, and it is stated that this new material is "far tougher and stronger than cast iron."

Reilly to Build Brooklyn Plant

The household goods storage firm of Peter F. Reilly's Sons, Brooklyn, has filed plans for a \$125,000 nine-story addition adjoining its present warehouse at 491-495 Bergen Street.



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Take One of The Most Successful Firms You Know And Multiply By Three

That will give you the approximate efficiency and importance of our new organization.

Engineers and Architects

Chas H. Moores Co.

successors to

Moores & Dunford, Inc. 110 East 42nd St., N. Y. C.

Announce Their Merger with

Fletcher Thompson, Inc. Bridgeport, Conn. Newark, N. J. Samuel M. Green Co. Springfield, Mass.

New Headquarters 110 East 42nd St., N. Y. C.

This merger is of immediate value to warehousemen because it places at their disposal the resources of three great companies.

When you build that new warehouse—cold storage, merchandise, household goods or combination—or extend your present facilities, our work will give complete satisfaction—and meet your budget.

Hotel Dixie

42d-43d Streets West of Broadway

A New and Better Hotel for Times Square



Not alone new in construction and equipment, but new in conception of service and comfort to its guests. Ditected by S. Gregory Taylor, who has made such enviable successes of the Hotels Montclair and Buckingham.

> Single Rooms with tub and shower

\$3,\$4 and \$5

Double Rooms with tub and shower

\$4,\$5 and \$6

A few terraced rooms and suites, exceptionally large closets, on an attractive monthly basis.

RADIO IN EVERY ROOM
Entrances on 42nd and 43rd Sts.

CENTRAL UNION BUS TERMINAL

LOCATED IN THE DIXIE HOTEL BUS CONNECTIONS FOR ALL POINTS IN THE UNITED STATES

A Message

from

B. A. Gramm



MR. B. A. GRAMM
President and Treasurer
Gramm Motors, Inc.,
Delphos, Ohio.

Dean of the Motor Truck

Industry

INTEGRITY

To my mind, one of the greatest pleasures in life is the realization of a worth-while task well done.

Integrity has been the watchword during my thirty years of engineering experience in motor truck building.

As a Thirtieth Anniversary achievement it is most fitting that we should offer the buying public the fruits of these years of labor by giving them the best in Motor Trucks that money can buy.

Highest standards of workmanship are embodied in all Gramm trucks—which explains their long life, sturdy performance and low operating cost.

Each chassis admirably sustains the Gramm slogan:

"POWERFUL AND FAST— BUILT TO LAST!"

GRAMM MOTORS, Inc.

Builders of fine Motor Trucks, Vans and Coaches

DELPHOS, OHIO, U. S. A.

EXPORT

Willys-Export Corporation

Toledo, Ohio, U. S. A.



EXPORT

Willys-Overland Crossley, Ltd.

> Stockpart, England

OBITUARY

W. J. Buchanan

WILLIAM J. BUCHANAN, who was manager of the Wilson Storage & Transfer Co., Sioux Falls, S. D., and who as a traffic expert was at one time active in the affairs of the American Warehousemen's Association, died at his Sioux Falls home on June 20. Burial was in Minneapolis, where he formerly lived.

In his long career in the public storage industry "Buck" Buchanan had been at various times identified with the former Minneapolis Terminal Warehouse Co. as manager and operating executive; Griswold & Walker, Inc., Chicago; the Lee Terminal Warehouse Corporation, Tampa; and the Minnesota-Atlantic Transit Co., as traffic manager with headquarters in Detroit.

At one time Mr. Buchanan served as chairman of the traffic committee of the American Warehousemen's Association and in that capacity he filed with the Interstate Commerce Commission a brief setting forth the association's policy with regard to railroad rate structure. He was looked upon as an authority on rates in relation to distribution through warehouses and at one A.W.A. convention made an address on the subject.

Carlisle Cameron

DEATH on July 11 removed Carlisle Cameron, treasurer of the Cameron Transfer & Storage Co., a Minneapolis firm which he founded fifty years ago.

Born in Adamsville, Que., Canada, Mr. Cameron was 72 years old. He went to Minneapolis in 1880. In 1924 he sold the controlling interest in his business to his son-in-law, Joseph R. Cochran, now the firm's president, who is a director of the National Furniture Warehousemen's Association.

Mr. Cameron is survived by his wife, two daughters, two brothers and three grandchildren.

D. W. Dunn

D. W. Dunn, head of the D. W. Dunn Storage Co., 3175 Washington Street, Boston, and widely known in the household goods warehousing and moving business, died recently at his home in Boston at the age of 53.

Mr. Dunn started his business career in 1896 with a single horse and wagon. At the time of his passing his motor vehicle fleet was one of the largest in Massachusetts.

He was a native of Boston and had raised a family of ten children. His widow, brother and oldest son and daughter will carry on the business.

Calgary Merger

Announcement was made by P. Laurendeau, president of the Calgary Stor-

age & Cartage Co., Calgary, Canada, on Aug. 15, that his organization had completed a merger with R. A. James, who was formerly engaged in country hauling.

The amalgamation makes the Calgary firm one of the largest cartage companies in Alberta. The company does also a merchandise and household goods storage business.

For Sale

ONE RA-7 tractor type elev. platform truck complete with 8 cells of 19 plate exide lead battery, and vertical lift platform 15 in. long and 22 in. wide, 85% in. high in lowered position. Lifting height 31/4 in. Length overall 55 in., equipped with hooks for trail-Wheelbase ing purposes. 231/2 in. Equipped with counterweights under platform. Rubber trailer and drive wheel tires. Price \$1,-200. Address Day & Meyer, Murray & Young, Inc., "Portovault Storage," 1166-1170 2nd Avenue, New York City.

Mason City, Iowa Has New Warehouse

The Mason City Warehouse Corporation, the organizing of which, in Mason City, Iowa, was announced in the August issue of *Distribution and Warehousing*, expected to have its storage building ready for occupancy about Sept. 1, according to F. D. Pearce, president.

The fireproof structure, designed along modern lines, will handle household goods and merchandise and will distribute in Mason City and surrounding territory.

Because of the large area of land acquired, the company is confining its warehouse to a single story. It is built in two parallel units, one served along the outside by the Chicago and North Western and the other along the outside by the Chicago, Rock Island & Pacific Between the two units is a common driveway for trucks. The grades are so arranged that the same level applies to the car level, warehouse floor and truck body, thereby expediting handling of commodities. The structure has a frontage of 205 feet, while the extreme portion rurs back approximately 375 feet.

E. E. Marriott, Santa Maria, Cal., has purchased from his uncle, Charles E. Marriott, the transfer and storage business which the elder Mr. Marriott established nearly thirty years ago.

The Schramm-Kindermann Party Aboard Ship for Europe



Seated are Louis Schramm, Sr., president of the Chelsea Fireproof Storage Warehouses, Inc., New York, and George Kindermann, president of Julius Kindermann & Sons, Inc., New York, who sailed with their families on July 17 to tour European countries by train and motor car. They plan to return to New York on Sept. 19

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The Belvedere Hotel

48th Street, West of Broadway NEW YORK CITY

TIMES SQUARE'S FINEST HOTEL

Large single rooms 11.6x20 with bath . \$4.00 per day For two . \$5.00 . . . twin beds . \$6.00 Large double room, twin beds, bath . . \$6.00 per day Special weekly rates

Within convenient walking distance to important business centers and theatres. Ideal transit facilities. 450 rooms, 450 baths . . . Every room an outside room-with two large windows . . . Furnished or unfurnished suites with serving pantries . \$95 to \$150 per month . . Moderately priced restaurant featuring a peerless cuisine.

Illustrated booklet free on request

CURTIS A. HALE, Mgr. Dir.

Do You Want This Book?

Now ready—a book of Average Motor Truck and Trailer Costs. Filled with figures that you'll find helpful in reducing your Overhead Costs. Unusually complete and right up to date. Write us for your copy-no obligation.

FRUEHAUF TRAILER **COMPANY**

10936 Harper Ave., Detroit, Michigan



HOTEL CENTURY



111 West 46th St. Just East of Broadway New York City

JUST COMPLETED every modern appoint-

350 Rooms-350 Baths Every Room Has Private Bath

\$3.00 Per Day SPECIAL WEEKLY RATES

Situated in the heart of the city; near Railway Terminals. All Leading Shops and Theatres within a stone's throw.

J. A. FLOOD, Resident Manager

New Incorporations as Announced Within the Storage Industry

California

L OS ANGELES — Economy Fast Freight, Inc. Motor freight service. Capital, 40,000 shares of no par value stock. Incorporators, E. M. McAlpine, S. N. Thompson and L. Jacobson.

Los Angeles—Westwood Hills Van & Storage Co., Inc. Storage warehouse and van service. Capital, \$20,000. Incorporators, A. K. Booth, E. S. Booth and W. J. Burns.

Florida

Jacksonville—Price Transfer & Storage Co. General moving and hauling. Capital, 50 shares at \$100 each. Incorporators, M. McLaughlin, Charles H. Dukes and H. A. McLaughlin.

Tampa—Tampa Union Terminal, Inc. Terminal warehousing and transfer. Capital not stated. Principal incorporator, H. Donaldson, 5809 Suwanee Street.

Illinois

Chicago—Central States Transit Co., 310 North Union Street. Transportation of freight, etc. Capital, \$20,000. Incorporators, W. S. Miller, J. M. Jacobson and Herman A. Fischer.

Chicago — Inter-Terminal Transportation Co., 1101 South Sherman Street. General transportation business. Capital, 100,000 shares of no par value stock. Incorporators, Deforest C. Barrett, John W. Schultz and others.

Chicago — Ravenswood Ice Co., 4628 Greenview Avenue. Cold storage warehouse and ice plant. Capital, \$10,000. Incorporators, Maurice A. Riskind and Benjamin E. Jaffe.

Indiana

Bedford—Red Ball Transit Company of Bedford, Indiana, Inc. Capital, 100 shares of stock each with \$100 par value. Incorporators, William S. Armstrong, Robert E. Armstrong and Charles O. Armstrong.

Fort Wayne—Mitchell Sales & Storage, Inc. Capital stock, 1,000 shares of common with par value of \$100 each and 500 shares of preferred with par value of \$100 each. Incorporators, J. R. Mitchell, president of the Mitchell Sales & Storage Co. established in 1924; J. Roger Mitchell, secretary of that firm; and Florence L. Mitchell and Dorothy Duryes.

Fort Wayne—State Warehouse Storage Company, Inc. Storage and warehousing of merchandise, etc. Capital stock, 500 shares at \$50 each. Incorporators, L. W. Dailey, Gerald A. Zent, Melvin M. Beaver and Clem C. Hiser.

South Bend — Western Michigan Transportation Co. has filed in Indiana with Frank Gilmer of South Bend as agent. Capital stock represented in Indiana, 847 shares.

Massachusetts

Boston — Boston & Portland Fast Freight (organized). Louis Feldman and William Gordon head the interests.

Boston-H. & S. Motor Transportation Co. Capital, \$5,000. Murray N. Silverman, 55 Esmond Street, Dorchester, is president.

Boston—People's Storage Warehouse. Warehouse and moving, van service, etc. Julian C. Besarick, 124 Norfolk Avenue, Roxbury, is head.

Vineyard Haven — Norton-Bradley Island Transports, Inc. Freight service and transfer. Capital, \$100,000. Charles S. Norton, Tisbury, is president.

Michigan

Detroit — McFadden Distributing Co. Transfer and distributing. Capital, \$25,-000. Incorporators, L. H. McFadden and I. M. McFadden.

Detroit — Q-D Forwarding Co., recently organized under Delaware laws, has filed notice to operate in Michigan. Capital, 3,000 shares of no par value stock. Representative, Wyman J. Crocker, 751 15th Street.

Kalamazoo—Michigan Interstate Motor Freight, Inc. Capital, \$25,000. Incorporators, John P. Koettner, Matthew P. Hansen and Mabel C. Hansen.

New Jersey

Bradley Beach — Apex Express, Inc. Motor freight service. Capital, \$125,000.

Newark—Fred Bonnet Ice Co., Cold storage warehouse and ice plant. Capital, 1,000 shares of no par value stock. Incorporators, Fred Bonnet and George Bonnet.

Ocean City—New Jersey & Delaware Transportation Co. Capital, \$100,000. Incorporators, R. V. Weber, E. O. Trout and M. S. Donaghy.

New York

Flushing — Flushing Van & Storage Co. Storage warehouse and van service. Capital, \$5,000. Company representative, J. Scheppi, Corona.

Mount Vernon—American Fur Storage Co., Inc. Cold storage warehouse. Capital, 200 shares of no par value stock.

New York City — Mercantile Warehouse Corporation. Capital, \$20,000. Principal incorporator, M. C. D'Agrossa.

New York City—Herman Meyers Moving Co. Capital, \$20,000. Principal incorporator, R. P. Berman, 320 Broadway.

New York City—Peerless Auto Trucking Co. Capital, 150 shares of no par value stock. Representative, H. B. Schell, 217 Broadway.

Ogdensburg — Big Bell Corporation. Storage warehousing and transfer. Capital, \$50,000. Representative, Dwight K. Yerxa, Lafayette Building, Buffalo.

Ohio

Cleveland—Bell Motor Freight Co., 1230 Hamilton Ave. Capital, 250 shares of no par value stock. Incorporators, J. Q. Whitner, L. G. Krupar and Louis Gilman.

Cleveland—Continental Storage Co. Capital, 250 shares of no par value stock. Incorporators, Raymond D. Metzner, Edward P. Blaugrand and R. Isaacson.

Cleveland — Midwest Motor Freight, Inc. Capital, 250 shares of no par value stock. Incorporators, Roland H. Mertz, Nova M. Mertz, Carl Kirchbaum and Annabelle Kirchbaum.

Cleveland—National Storage Co. Capi-(Concluded on page 66) Construction
Developments,
Purchases, Etc.

Arizona

Y UMA — Yuma Bonded Warehouse Co. is planning early construction of a \$70,000 dry and cold storage warehouse on Gila Street.

California

Live Oak—Walnut Growers' Association has approved plans for a \$35,000 l. story warehouse, 90 by 120 feet.

Los Angeles—Los Angeles Warehouse Co. is planning early rebuilding of a warehouse recently damaged by fire (See page 29.)

Watsonville — Apple Growers' Cold Storage Co. has approved plans for a \$75,000 1-story cold storage warehouse addition.

Wilmington—Union Ice Co. has been granted a certificate to operate a cold storage warehouse and is erecting such a building.

Canada

Fort William, Ont.—Canadian National Railways will rebuild its warehouse and freight building recently wrecked by fire with an estimated loss of \$85,000.

Connecticut

Norwalk — Hain Brothers have approved plans for immediate construction of a \$55,000 1-story cold storage warehouse and ice plant, 55 by 150 feet.

Georgia

Augusta—Crystal Ice Corp. is planning to build a \$70,000 cold storage warehouse and ice plant on Twiggs Street near 9th Street.

Illinois

Joliet—Elgin, Joliet & Eastern Railway Co. has plans for a \$60,000 addition, 88 by 124 feet, to its warehouse and freight building on Maple Street.

Rockford—American Railway Express Agency has leased a 1-story building to be erected at a cost of \$40,000 and will occupy it as a warehouse and garage.

Indiana

Elwood — Elwood Transfer Co. has purchased a former broom factory building at North D and 12th Streets and will occupy it.

Louisiana

Haynesville Warehouse Co. is planning to double its capacity by erecting a \$70,000 addition, 110 by 150 feet.

Opelousas—Gulf Transportation Lines, Inc., recently organized by J. P. Barnett and associates, has acquired the franchises of the Gulf Freight Lines and other motor freight lines and will consolidate into one unit.

Massachusetts

Fall River—Ice Service Co. is considering plans for a \$55,000 1-story cold storage warehouse and ice plant.

(Concluded on page 66)

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WHEN WRITING ADVERTISERS MENTION DISTRIBUTION AND WAREHOUSING

Construction, Developments, Purchases, Etc.

(Concluded from page 64)

Michigan

Battle Creek — Battle Creek Storage Co. has removed from 50 South Madison Street to 146 South Jefferson Avenue, where the warehouse has a siding on the Michigan Central.

Detroit—Detroit Union Produce Terminal Co. has plans for a \$100,000 warehouse, 150 by 400 feet, on West Fort Street.

Ishpeming—Duluth, South Shore & Atlantic Railway Co. has plans for a \$25,000 1-story warehouse and freight building.

New Jersey

Clifton—Erie Railroad Co. is said to be planning a \$200,000 2-story warehouse and freight building in the Lakeview district.

Jersey City — Goodman Warehouse Corp. is planning to rebuild that portion of its 10-story warehouse recently damaged by fire with a reported loss of about \$80,000. (See story on page 44.)

Newark—Erie Industrial Terminal Co., affiliated with the Erie Railroad, has tentative plans for a \$1,500,000 warehouse freight terminal project, 100 by 450 feet, at Ogden and Gouveneur Streets.

New York

New York City—Arcade Motor Transportation Co., of Philadelphia, has purchased the 4-story building, 45 by 82 feet, at 403 West Street, New York City, and will occupy it for storage, transfer and office service.

New York City—John O'Brien Co., operating a storage and moving business, has leased space in the building at 217 East 34th Street.

New York City—Stuyvesant Storage & Moving Co., Inc., has filed notice of increase in capital to \$50,000 from \$20,000, for expansion.

Ohio

Cincinnati—Cincinnati Union Terminal Co. has applied to the Interstate Commerce Commission for permission to issue bonds in amount of \$30,000,000, and notes for \$15,000,000, majority of fund to be used to finance a terminal and warehouse project to comprise a group of multi-story units estimated to cost about \$42,000,000.

Cincinnati — West Virginia Coal & Coke Corp. is planning to spend \$500,000 erecting a river-and-rail terminal project at the foot of Mills Street.

Springfield—Wendt Transfer & Storage Co. has installed a carpet cleaning and repairing department.

Toledo—Citizens' Ice & Fuel Co. is planning construction of two cold storage warehouse and ice plants to cost about \$400,000 with equipment. The firm is a subsidiary of Ice Service, Inc., Springfield, Mass.

Oregon

Portland—Portland Auto Terminal Co. has received a city permit to construct a \$20,000 warehouse at 567 Kearney Street.

Pennsylvania

Philadelphia — Pennsylvania Railroad Co. has taken out a permit for a \$50,000 warehouse at 49th Street and Parkside Avenue.

Pittsburgh — Baltimore & Ohio Railroad Co. has applied for a Federal permit to construct and operate a rail-andriver terminal, to include loading pier, buildings, etc., and to cost about \$450,000, on the Monongahela River.

Tevas

Amarillo — Armstrong Transfer & Storage Co. is building a \$3,000 addition

El Dorado—West Texas Utilities Co. is said to be planning construction of a \$40,000 cold storage warehouse and ice plant.

Harlingen — Missouri Pacific Railroad Co. has plans for a \$50,000 1-story warehouse and freight building, 25 by 200 feet.

Rio Hondo — Rio Hondo Ice Co. is planning construction of a \$40,000 1story cold storage warehouse and ice plant.

Vermont

White River Junction — Central Vermont Railway Co. has authorized construction of a \$45,000 1-story warehouse and freight building.

Virginia

South Hill — Virginia Warehouse is building a \$45,000 storage plant, with 30,000 square feet of floor space, to replace a unit recently wrecked by fire.

Washington

Seattle—Eyres Storage & Distributing Co., Inc., is completing plans for a \$150,-000 3-story and basement warehouse, 102 by 148 feet, at 2253 1st Avenue South.

Wisconsin

Sheboygan—Sheboygan Furniture Forwarding Co. has filed plans for a 1-story addition.

Bartholomew Buys Millen Business

F. A. Bartholomew, until recently for twenty-three years city treasurer of Colorado Springs, Colo., has purchased the merchandise and household goods warehouse business which J. M. Millen has conducted in that city for the past two decades. The building, located at 107-111 South Nevada Avenue, contains about 12,000 square feet. Mr. Millen was a member of the Colorado Transfer & Warehousemen's Association.

Mr. Bartholomew before becoming city treasurer was in the express business, at one time being cashier of the Rio Grande Express Co.

New Incorporations as Announced Within the Storage Industry

(Concluded from page 64)

tal, 250 shares of no par value stock. Incorporators, C. R. Berne, E. L. Mueller and M. Moran.

Marion—C. & M. Transport, Inc. Authorized capital, \$25,000. Incorporators, H. P. McFarland, John H. Smith and A. T. Williamson.

Toledo—S. & C. Trucking Co. Capital, 250 shares of no par value stock. Incorporators, Nathan Schulak, Marcus Friedman and A. Barry.

Pennsylvania

Philadelphia—Miller Moving Co. Moving and express. Edward A. Miller, 2748 North Lawrence Street, is head.

Rhode Island

Providence—Oliver Boston & Providence Transportation Co. Principal incorporator, E. Voyer, 867 Washington Street, South Attleboro, Mass.

Providence—Sommer's Transfer Co, of Springfield, Mass., has filed notice of company organization to operate in Providence and other Rhode Island cities.

Providence—Tyler Ice Co. Cold storage warehouse and ice plant. Capital, 100 shares of no par value stock. Incorporators, William A. Tyler, Richard W. Littlefield and Andrew A. Tyler.

Texas

Forth Worth—Pure Ice Co., Inc. Cold storage warehouse and ice plant. Capital, \$25,000. Principal incorporator, J. E. Barr, 3701 Avenue G.

San Antonio—Texas Cold Storage, Inc. Cold storage warehousing. Capital, \$25,000. Principal incorporator, W. A. Williams, 1002 West Kingshighway.

Virginia

Cape Charles—Peninsular Terminal Corporation. Terminal warehouse, transfer, etc. Capital, \$50,000. Principal incorporator, J. Warren Toppin.

Wisconsin

Monticello—Monticello Cold Storage Co. Cold storage warehousing. Capital, \$35,000. Incorporators, Edward Wittwer and Albert Knobel.

Racine—Racine-Kenosha Warehouse Co. Warehousing and moving. Capital, \$10,000. Incorporators, Samuel P. Myers and Frederick P. Helm.

Your Investment and Space Area

D o you want these figures included in your 1931 Warehouse Directory listing? If you do, your listing must be Starred. It cannot be Starred unless you have notaried your Information Sheet. Think that over. If you don't now, the national distributor will when he consults it throughout 1921

THE MOST RECENT

This Month's Features in News and Articles

"Chinese Doctor Plan"

THIS INTRIGUING appellative has to do with motor truck up-keep economy. Philip L. Sniffin, advisory engineer, tells about it on page 35.

Developing New Business STORAGE of tires as a source of revenue for the warehouseman is discussed by H. A. Haring in this month's article, the fifty-

discussed by H. A. Haring in this month's article, the fifty-ninth of his "New Business" series. Here are some profits-earning suggestions—page 31.

Distribution Census

THE FIRST definite and authoritative explanation of what President Hoover's current Cenpractical business man is presented by William L. Daley. Turn to page 14.

Field Warehousing

WHAT HAVE BEEN the developments of 1930 in this branch of the public storage business? Mr. Haring tells, in the sixty-seventh of his "Distribution" series. Article begins on page 23.

Government Competition

A STORY OF the I. C. C. hearing on the Inland Waterways Corporation's free storage policy, at Memphis on Sept. 30, begins on page 9. How and why the country's beet sugar interests have protested against the policy is told in Horace H. Herr's Washington correspondence on page 10. And what Distribution and Warehousing has been doing to help the industry in its

fight is related on page 10.

"How's Business?"

A FORECAST of conditions as charted by thirty-four economic experts—editors of magazines published by the United Business Publishers, Inc.—appears on page 17.

Legal Knots

Legal Knots

Legal Knots

LEO T. PARKER, an attorney, unties them on request for warehouseman and traffic manager. Borrow on his knowledge and experience. This authority also reviews the latest Court decisions of importance to the industry. Turn to page 33.

Motor Freight
THE TRUCKMEN'S tax barometer—
page 37. States' average levy on motor
vehicles—page 37. New models—page
38. Pacific Coast chain—page 38. A Michigan Court ruling
page 39.

Occupancy and Tonnage figures issued by the Government indicate continued decrease in goods in storage in merchandise warehouses—a falling off of nearly 10 per cent since the high peak of last Nov. 30. Turn to page 18 for the Department of Commerce table and accompanying explanatory text.

Personality
OUT OF THE grocery business into warehousing went James A. Walker, today president of the Reliable Transfer & Storman begins on page 27.

"Two Bits"

OF THIS intermittent series of non-seriousness—the editor's so-called thoughts in his off-moments—No. 7 of Vol. X will be found on page 26.

Warehouse Directory

DON F. HARNER, traffic manager of Stewart Curtis Packers, Inc., tells of the Value—to national distributor and storage executive—of Distribution and Warehousing's annual reference volume. As the 1931 edition, to appear in January, is now being compiled, this is a particularly timely article. See page 20.

Warehouse Receipts

THE TITLE OF the thirty-third of Leo T. Parker's series of legal texts is "The Law of Forged and Altered Warehouse Receipts." Here is information of value to shipper and storage operator. Turn to page 28.

With the Associations

NEWS FROM Atlanta, Canada, Connecticut, Detroit,
Maryland, New York, Pennto page 41.

Directory of Warehouses . . . Pages 76 to 153 Directory of Motor Freight Lines Pages 154 to 156 Where to Buy Department . . . Pages 59 to 73

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